YAMAHA

DIGITAL WORKSTATION

Tyros4

Data List / Daten-Liste / Liste des données

Contents

EN
DE
FR

U.R.G., Digital Musical Instruments Division

008PO-A0

Panel Voice

Category	Voice Name	Voice Number			Voice Type
		MSB	LSB	PRG	
Piano	ConcertGrand	0	122	1	S.Articulation!
	PopGrand	104	11	1	S.Articulation!
	RockPiano	104	10	1	S.Articulation!
	AmbientPiano	104	9	1	S.Articulation!
	CocktailPiano	104	1	4	S.Articulation!
	MIDIGrand	104	2	3	S.Articulation!
	MIDIGrandPad	104	3	3	S.Articulation!
	MIDIGrandSyn	104	8	1	S.Articulation!
	PianoOrchestra	104	12	1	S.Articulation!
	Harpsichord	8	32	113	S.Articulation!
	GrandPiano	0	113	1	Live!
	WarmGrand	0	114	1	Live!
	BrightPiano	0	112	2	Live!
	OctavePiano1	104	2	4	S.Articulation!
	OctavePiano2	104	3	4	S.Articulation!
	Pianosphere	104	19	89	-
	HonkyTonk	0	112	4	-
	CP80	0	113	3	-
	GrandHarpsi	0	113	7	Live!
E.Piano	SparkleStack	0	121	6	Cool!
	SweetDX	104	0	6	Cool!
	BalladDX	0	124	6	Cool!
	DX Dynamics	0	123	6	Cool!
	BalladBells	104	2	6	Cool!
	GalaxyEP	0	114	5	Cool!
	SuitcaseEP	0	118	5	Cool!
	Magnetics	104	0	5	-
	ElectricPiano	0	119	5	Cool!
	TremoloEP	0	113	5	Cool!
	DreamDX	104	3	6	Cool!
	MidnightDX	104	1	6	Cool!
	VintageEP	0	116	5	-
	StageEP	0	117	5	-
	SmoothTine	0	119	6	-
	Clavi	0	112	8	-
	WahClavi	0	113	8	-
	PhaseClavi	0	115	8	-
Organ	WhiterBars	8	32	30	S.Articulation!
	AllBarsOut	8	32	31	S.Articulation!
	JazzRotary	8	32	114	S.Articulation!
	ClassicBars	8	34	30	S.Articulation!
	Organ-a-Gogo	104	0	17	Cool!
	60'sCombo1	104	32	17	Cool!
	60'sCombo2	104	33	17	Cool!
	60'sCombo3	104	34	17	Cool!
	60'sCombo4	104	35	17	Cool!
	ProgRockOrgan	8	33	30	S.Articulation!
	CurvedBars	0	121	17	Cool!
	EvenBars	0	111	17	Cool!
	VintageFast	0	127	17	Cool!
	RotorOrgan	0	117	19	Cool!
	JazzOrgan	0	117	17	Cool!
	RockRotary	8	33	114	S.Articulation!
	Hold It Fast	0	111	18	Cool!
	R&B Tremolo	0	111	19	Cool!
	FullRocker	0	115	19	Cool!
	Organ	0	118	19	Cool!
	OrganAccomp1	0	108	18	-
	OrganAccomp2	0	107	18	-
	OrganAccomp3	0	106	18	-
	OrganAccomp4	0	105	18	-
	OrganAccomp5	0	104	18	-
	FullTheatre	0	127	19	-
	SweetTheatre	0	126	19	-
	BallroomOrgan	0	115	4	-
	Tibia 16&4	104	8	17	-
	Tibia 8&4	104	9	17	-
	Vox&Tibia	104	10	17	-
	Tibia Full	104	5	18	-
	Tibia 8	104	6	18	-
	Vox 8	104	7	18	-
	PipeOrgan	0	112	20	-
	ChapelOrgan1	0	113	20	-
	ChapelOrgan2	0	114	20	-
	ChapelOrgan3	0	115	20	-
	JazzSlow	0	126	18	Cool!
	JazzFast	0	127	18	Cool!
	WhiterBarsSlow	104	1	18	Cool!
	WhiterBarsFast	104	0	18	Cool!
	AllBarsOutSlow	104	1	19	Cool!
	AllBarsOutFast	104	0	19	Cool!
	AllBarsPhase	104	2	19	Cool!
	TwoChannels	0	109	18	Cool!
	EuroOrgan	0	118	17	-
	MellowDraw	0	115	18	-
	Trumpet 8	0	124	17	-
	Kinura 8	0	123	17	-

Category	Voice Name	Voice Number			Voice Type
		MSB	LSB	PRG	
Organ	Tpt&Kinura	0	125	18	-
	Trumpet 16&8	0	124	18	-
Strings	RealStrings	8	33	50	S.Articulation!
	ClassicalStrings	8	36	49	S.Articulation!
	TheatreStrings	8	37	49	S.Articulation!
	LushStrings	8	41	49	S.Articulation!
	BallroomStrings	8	35	50	S.Articulation!
	JazzViolin	8	64	49	S.Articulation2!
	CelticViolin	8	65	49	S.Articulation2!
	RealTremolo	104	0	45	Live!
	RealSpiccato	104	6	49	Live!
	OrchestralHarp	104	1	47	-
	BalladStrings	8	34	50	S.Articulation!
	ConcertStrings	8	32	50	S.Articulation!
	StudioStrings	8	32	49	S.Articulation!
	DiscoStrings1	0	123	50	Live!
	DiscoStrings2	0	124	50	Live!
	Violin	0	113	41	Sweet!
	Pizzicato	0	113	46	Live!
	TremoloStrings	0	113	45	Live!
	Spiccato	0	120	49	Live!
	MovieStrings	0	123	49	Live!
	Banjo	104	0	106	-
	Hackbrett	104	2	47	-
	Zither1	104	1	16	-
	Zither2	104	0	16	-
	OrchestraHit	0	112	56	-
	WarmStrings	8	39	49	S.Articulation!
	BigStrings	8	40	49	S.Articulation!
	DynamicStrings	0	124	49	Live!
	Strings	0	117	50	Live!
	Allegro	0	122	50	Live!
	RealStrings p	8	42	50	S.Articulation!
	RealStrings mf	8	41	50	S.Articulation!
	RealStrings f	8	40	50	S.Articulation!
	RealTremoloSfz	104	1	45	Live!
	MellowHarp	104	0	47	-
	Strings p	0	117	49	Live!
	Strings mf	0	118	49	Live!
	Strings f	0	119	49	Live!
	Tutti	0	120	50	-
	SymphonicUnison	104	0	50	-
	Spiccato	8	33	49	S.Articulation!
	SynthStrings1	0	112	51	-
	SynthStrings2	0	113	51	-
	OberStrings	0	113	52	-
	TheatreOrchestra	104	1	50	-
	SoloViolin	0	112	41	-
	Viola	0	112	42	-
	Cello	0	112	43	-
	Contrabass	0	112	44	-
	Fiddle	0	112	111	-
	Koto	0	112	108	-
	Shamisen	0	112	107	-
	ChamberStrings	0	112	50	-
	TremoloBowing	8	34	49	S.Articulation!
	RealStrings f	104	4	50	Live!
	RealStrings mf	104	5	50	Live!
	RealStrings p	104	6	50	Live!
	ClassicalStrings	8	1	49	MegaVoice
	RealStrings	8	1	50	MegaVoice
	SmallStrings	8	0	49	MegaVoice
	LargeStrings	8	0	50	MegaVoice
Choir	ScatVocalists	8	42	56	S.Articulation!
	JazzSingersShoo	8	45	56	S.Articulation!
	JazzSingersDwee	8	46	56	S.Articulation!
	PopEnsemble	8	40	56	S.Articulation!
	LatinVocals	8	41	56	S.Articulation!
	BoysChoirOoh	8	32	52	S.Articulation!
	BoysChoirAah	8	33	52	S.Articulation!
	GospelHmm	8	32	55	S.Articulation!
	GospelWow	8	33	55	S.Articulation!
	GospelHey	8	34	55	S.Articulation!
	ShooBeeDooBah1	8	32	56	S.Articulation!
	DoBeDoBe	8	48	56	S.Articulation!
	BaDaYah	8	36	56	S.Articulation!
	WhtShouldWeDo	8	53	56	S.Articulation!
	WhoAreYou	8	54	56	S.Articulation!
	ShooBeeDooBah2	8	47	56	S.Articulation!
	YaBaDaBa	8	51	56	S.Articulation!
	DoWeYoBe	8	52	56	S.Articulation!
	ShooBaDooBa	8	55	56	S.Articulation!
	HooWah	8	39	56	S.Articulation!
	Haa	8	32	40	S.Articulation!
	Wah	8	38	40	S.Articulation!
	Baa	8	41	40	S.Articulation!
	Daa	8	45	40	S.Articulation!

Category	Voice Name	Voice Number			Voice Type
		MSB	LSB	PRG	
Choir	Ooh	8	32	41	S.Articulation!
	Doo	8	38	41	S.Articulation!
	Yoo	8	42	41	S.Articulation!
	BaroqueScat	8	43	56	S.Articulation!
	ScatmanLegato	8	50	56	S.Articulation!
	ShooBeeDynamic	8	35	56	S.Articulation!
	HaaVibrato	8	33	40	S.Articulation!
	WahVibrato	8	39	40	S.Articulation!
	BaaVibrato	8	42	40	S.Articulation!
	DaaVibrato	8	46	40	S.Articulation!
	OohVibrato	8	33	41	S.Articulation!
	DooVibrato	8	39	41	S.Articulation!
	YooVibrato	8	43	41	S.Articulation!
	BeeVibrato	104	4	53	Live!
	SoftChoirOoh	8	35	52	S.Articulation!
	SoftChoirAah	8	36	52	S.Articulation!
	OohBoys	8	34	41	S.Articulation!
	OohGirls	8	36	41	S.Articulation!
	HaaBoys	8	34	40	S.Articulation!
	HaaGirls	8	35	40	S.Articulation!
	AahOoh Auto	8	49	41	S.Articulation!
	OohBoysVibrato	8	35	41	S.Articulation!
	OohGirlsVibrato	8	37	41	S.Articulation!
	DooBoys	8	40	41	S.Articulation!
	DooGirls	8	41	41	S.Articulation!
	HooWee Auto	8	56	56	S.Articulation!
	WowHeyHmm	8	35	55	S.Articulation!
	GospelMW1	8	36	55	S.Articulation!
	GospelMW2	8	37	55	S.Articulation!
	BoysChoirMW	8	34	52	S.Articulation!
	BoysChoirOoAa	8	49	56	S.Articulation!
	GospelHmm	104	12	54	Live!
	GospelWow	104	13	54	Live!
	GospelHey	104	7	53	Live!
	AccompAah	104	15	53	Live!
	AccompOoh	104	15	54	Live!
	Haa	104	9	53	Live!
	Wah	104	10	53	Live!
	Baa	104	12	53	Live!
	Daa	104	13	53	Live!
	Doo	104	16	54	Live!
	Ooh	104	17	54	Live!
	Yoo	104	18	54	Live!
	SoftWah	8	40	40	S.Articulation!
	GothicVox	0	113	54	-
	Mmh	0	117	53	Live!
	GospelChoir	8	0	55	MegaVoice
	MaleVoiceChoir	8	0	52	MegaVoice
	PopHaa	8	0	101	MegaVoice
	PopDaa	8	0	102	MegaVoice
	PopBaa	8	0	103	MegaVoice
	PopHoo	8	0	106	MegaVoice
	PopDoo	8	0	107	MegaVoice
	PopShoo	8	0	104	MegaVoice
	PopHee	8	0	111	MegaVoice
	PopBee	8	0	108	MegaVoice
	PopHaa L2	8	0	116	MegaVoice
	PopHoo L2	8	0	121	MegaVoice
	PopHee L2	8	0	126	MegaVoice
Brass	Horns	104	0	61	Live!
	SoftHorns	8	32	61	S.Articulation!
	SymphonyHorns1	104	1	61	Live!
	SymphonyHorns2	104	2	61	Live!
	WarmHorns	8	33	61	S.Articulation!
	BigBandBrass	8	37	57	S.Articulation!
	SmoothBrass	8	36	57	S.Articulation!
	DynamicBrass	0	127	62	Live!
	PowerBrass	0	121	63	Live!
	AccentBrass	0	109	62	Live!
	StoppedHorns	104	3	61	Live!
	MutedHorns	8	34	61	S.Articulation!
	Brass p	0	111	62	Live!
	Brass mf	0	110	62	Live!
	Brass f	0	108	62	Live!
	BrassFalls f	8	34	57	S.Articulation!
	BrassFalls mf	8	35	57	S.Articulation!
	BrassBand	0	123	57	Live!
	SoftHorns	0	117	61	Live!
	SoftTrombones	0	118	61	Live!
	BrassShake	8	32	57	S.Articulation!
	AccentFalls	8	38	57	S.Articulation!
	Sforzando	0	105	62	Live!
	SforzandoFall	0	107	62	Live!
	BrassDynamics	0	106	62	Live!
	PopBrass	0	117	63	Live!
	HyperBrass	0	118	63	Live!
	SmallBrass	0	120	61	Live!

Category	Voice Name	Voice Number			Voice Type
		MSB	LSB	PRG	
Brass	BallroomBrass	0	113	60	-
	OctaveBrass	0	116	63	Live!
	OberBrass	0	113	64	-
	ThinthBrass	104	0	63	-
	BrassProfit	104	1	63	-
	SlowPWMBrass	104	2	63	-
	FastPWMBrass	104	6	63	-
	SoftVeloBrass	0	120	63	-
	80'sBrass	0	113	63	-
	AnalogBrass	0	112	64	-
	SoftAnalog	0	114	64	-
	FunkyAnalog	0	115	63	-
	TechnoBrass	0	114	63	-
	OberHorns	0	115	64	-
	FatSynthBrass	0	116	64	-
	Brass	8	0	57	MegaVoice
Trumpet	JazzTrumpet	8	64	66	S.Articulation2!
	Trumpet	8	32	65	S.Articulation!
	SilverTrumpet	8	33	65	S.Articulation!
	GoldenTrumpet	8	34	65	S.Articulation!
	BigBandTrumpet	8	37	65	S.Articulation!
	ClassicTrumpet	8	65	66	S.Articulation2!
	Cornet	0	119	57	Sweet!
	MutedCornet	104	0	60	Sweet!
	FlugelHorn	0	118	57	Sweet!
	GoldenTrumpet	0	122	57	Sweet!
	SilverTrumpet	0	121	57	Sweet!
	MellowTrumpet	0	120	57	Sweet!
	Trumpet	0	115	57	Sweet!
	Trombone	0	117	58	Sweet!
	BrightTrombone	104	0	58	Sweet!
	TrumpetFall	8	38	65	S.Articulation!
	TrumpetShake	8	35	65	S.Articulation!
	Tuba	104	0	59	-
	MutedTrumpet	0	114	60	Sweet!
	BaritoneHorn	0	113	59	-
	BaritoneHit	0	114	59	-
	AlpBass	0	113	34	-
	Trumpet	8	0	65	MegaVoice
Saxophone	PopSoprano	8	64	85	S.Articulation2!
	BalladSoprano	8	65	85	S.Articulation2!
	JazzSax	8	65	81	S.Articulation2!
	BreathySax	8	64	81	S.Articulation2!
	Saxophone	8	32	83	S.Articulation!
	BigBandSax	8	35	83	S.Articulation!
	RockSax	8	33	83	S.Articulation!
	AltoSax	8	32	67	S.Articulation!
	SoftAlto	8	34	67	S.Articulation!
	GrowlSax	0	111	67	Sweet!
	SopranoSax	0	113	65	Sweet!
	AltoSax	104	0	66	Sweet!
	TenorSax	0	117	67	Sweet!
	BaritoneSax	104	0	68	-
	SaxSection	0	116	67	Live!
	SoftSaxes1	8	38	83	S.Articulation!
	SoftSaxes2	8	39	83	S.Articulation!
	BigBandSaxes	0	110	67	Live!
	BigBandUnison	0	109	67	Live!
	BigBandOctave	0	108	67	Live!
	PopTenor	0	127	67	Sweet!
	BalladTenor	0	126	67	Sweet!
	JazzTenor	0	125	67	Sweet!
	SaxSectionSoft	0	121	67	Live!
	SaxSectionHard	0	122	67	Live!
	SectionSaxes	8	36	83	S.Articulation!
	SectionSaxesOct	8	37	83	S.Articulation!
	SaxAppeal	0	123	67	Live!
	Moonlight	0	115	72	-
	BalladSection	0	119	67	-
	TenorSax	8	0	83	MegaVoice
Flute&Clarinet	Clarinet	8	65	93	S.Articulation2!
	BalladClarinet	8	64	93	S.Articulation2!
	RomanceClarinet	8	66	93	S.Articulation2!
	IrishPipeAir	8	64	109	S.Articulation2!
	IrishPipeDance	8	65	109	S.Articulation2!
	OrchFlute	8	32	74	S.Articulation!
	OrchOboe	8	32	69	S.Articulation!
	OrchClarinet	104	0	72	Live!
	OrchBassoon	104	0	71	Sweet!
	GermanClarinet	104	2	72	-
	Flute	0	114	74	Sweet!
	Oboe	0	113	69	Sweet!
	Clarinet	0	114	72	Sweet!
	PanFlute	0	113	76	Sweet!
	ClassicalFlute	0	115	74	Sweet!
	Flutes&Oboes	104	2	74	-
	Clarinet&Flutes	104	1	72	-

Category	Voice Name	Voice Number			Voice Type
		MSB	LSB	PRG	
Flute&Clarinet	Clarinet&Oboe	104	1	69	-
	DoubleReeds	104	2	69	-
	OrchWoodwind	104	1	71	-
	AltoFlutes	104	1	74	-
	Piccolo	0	112	73	-
	Whistle	0	112	79	-
	Recorder	0	112	75	-
	Ocarina	0	112	80	-
	Shakuhachi	0	112	78	-
	Bagpipe	0	112	110	-
	FluteEnsemble	0	116	74	-
Guitar	RockHero	8	35	6	S.Articulation!
	VintageAmp	8	41	4	S.Articulation!
	FingerChorus	8	42	4	S.Articulation!
	FingerAmp	8	43	4	S.Articulation!
	CountryPick	8	44	4	S.Articulation!
	ConcertGuitar	8	32	1	S.Articulation!
	SemiAcoustic	8	33	7	S.Articulation!
	SteelGuitar	8	32	2	S.Articulation!
	FlamencoGtr	8	33	1	S.Articulation!
	SingleCoilClean	8	39	4	S.Articulation!
	RockLegend	8	34	6	S.Articulation!
	GuitarHero	8	32	6	S.Articulation!
	VintageRock	8	36	6	S.Articulation!
	VintageBlues	8	37	6	S.Articulation!
	BluesWarm	8	34	5	S.Articulation!
	JazzClean	8	32	7	S.Articulation!
	BrightChorus	8	45	4	S.Articulation!
	BalladDelay	8	46	4	S.Articulation!
	WarmSolid	8	33	4	S.Articulation!
	CleanSolid	8	34	4	S.Articulation!
	Mandolin	0	114	26	Sweet!
	NylonGuitar	8	34	1	S.Articulation!
	FolkGuitar	8	33	2	S.Articulation!
	SmoothJazzGtr	8	35	7	S.Articulation!
	PedalSteel	8	36	4	S.Articulation!
	VintagePure	8	47	4	S.Articulation!
	VintageSlap	8	48	4	S.Articulation!
	FunkSlap	8	49	4	S.Articulation!
	FingerBright	8	50	4	S.Articulation!
	BluesBright	8	35	5	S.Articulation!
	StereoRock	104	2	31	Cool!
	CrunchGtr	8	33	6	S.Articulation!
	HeavyRock	8	32	5	S.Articulation!
	HalfDrive	8	37	4	S.Articulation!
	70'sSolidGtr	8	38	4	S.Articulation!
	VintageMute	104	0	29	Cool!
	Slapback	104	0	28	Cool!
	VintageLead	0	125	28	Cool!
	BluesGuitar	0	117	30	Cool!
	12StringGtr	0	113	26	Live!
	SlideNylon	0	117	25	Live!
	SlideJazz	104	0	27	Cool!
	SlideSteel	0	118	26	Live!
	SlideSolid	0	110	28	Cool!
	SlideClean	0	117	29	Cool!
	SlideFinger	104	5	28	Cool!
	SlideWarm	104	6	28	Cool!
	SlidePick	104	7	28	Cool!
	SlidePickAmp	104	8	28	Cool!
	DynamicMute	0	118	29	Cool!
	FingerSlapSlide	8	51	4	S.Articulation!
	BluesSlapSlide	8	36	5	S.Articulation!
	WarmElectric	8	32	4	S.Articulation!
	CleanElectric	8	35	4	S.Articulation!
	AlohaGuitar	0	118	27	-
	DynamicNylon	0	116	25	Live!
	DynamicSteel	0	116	26	Live!
	HardFlamenco	0	118	25	Live!
	JazzSoloGtr	0	116	27	Cool!
	PedalSteel	0	115	28	-
	LoungeGuitar	104	1	27	-
	CoolWahGuitar	104	4	28	-
	ElectricGtr	0	114	29	Cool!
	TremoloSolid	0	111	28	Cool!
	ChorusSolid	0	107	28	Cool!
	BalladSolid	0	109	28	Cool!
	SlapSolid	0	108	28	Cool!
	ClassicalGtr	0	115	25	Live!
	SteelGuitar	0	117	26	Live!
	Sitar	104	0	105	-
	NylonMute	0	119	25	Live!
	SteelMute	0	120	26	Live!
	Feedbacker	8	33	5	S.Articulation!
	PowerLead	0	115	31	Cool!
	CleanGuitar	0	112	28	Cool!
	60'sClean	0	117	28	-

Category	Voice Name	Voice Number			Voice Type
		MSB	LSB	PRG	
Guitar	CrunchGuitar	0	113	31	-
	VintageOpen	0	123	28	-
	VintageStrum	0	126	28	-
	VintageAmp	0	115	30	-
	VintageMutedGt	0	115	29	-
	MutedGuitar	0	119	29	Cool!
	HeavyStack	0	114	31	-
	OctaveGuitar	0	113	27	-
	JazzGuitar	0	115	27	Cool!
	FunkGuitar	0	116	29	Cool!
	FingerGtr	8	4	4	MegaVoice
	FingerSlapGtr	8	5	4	MegaVoice
	VintagePickGtr	8	6	4	MegaVoice
	VintageSlapGtr	8	7	4	MegaVoice
	SlapAmpGtr	8	8	4	MegaVoice
	SingleCoil	8	3	4	MegaVoice
	JazzGuitar	8	0	7	MegaVoice
	NylonGuitar	8	0	1	MegaVoice
	SteelGuitar	8	0	2	MegaVoice
	12StringGtr	8	1	3	MegaVoice
	HiStringGtr	8	0	3	MegaVoice
	SolidGuitar1	8	1	4	MegaVoice
	SolidGuitar2	8	2	4	MegaVoice
	CleanGuitar	8	0	4	MegaVoice
	OverdriveGtr	8	0	5	MegaVoice
	DistortionGtr	8	0	6	MegaVoice
Bass	SoftAcousticBass	8	33	17	S.Articulation!
	FretlessBass	8	32	20	S.Articulation!
	VintageRound	8	32	18	S.Articulation!
	VintageFlat	8	33	18	S.Articulation!
	VintageMute	8	32	19	S.Articulation!
	BallroomBass	104	0	33	Cool!
	ElectricBass	0	114	34	Cool!
	DynoPickBass	0	113	35	Cool!
	SlapBass	0	112	37	-
	HalfMute	0	115	34	Cool!
	AcousticBass	8	32	17	S.Articulation!
	FretlessBass	0	112	36	Cool!
	VintageRound	104	1	34	Cool!
	VintageFlat	104	2	34	Cool!
	VintageMute	104	3	34	Cool!
	AcousticBass	104	1	33	Cool!
	SoftAcousticBass	104	2	33	Cool!
	VintagePick	104	1	35	-
	LoBass	104	0	40	-
	DarkBass	104	1	40	-
	MoonBass	104	0	39	-
	KickBass	104	1	39	-
	ClubBass	104	2	39	-
	FatPulse	104	2	40	-
	WazzoSaw	104	3	81	-
	DeepPoint	104	3	39	-
	TightBass	104	3	40	-
	Competitor	104	4	39	-
	1o1Sub	104	5	39	-
	LittleBassSynth	104	6	39	-
	TeknoBass	104	7	39	-
	PercPunch	104	8	39	-
	SquareBass	104	4	40	-
	TranceBass	104	9	39	-
	SubCutBass	104	5	40	-
	DynoAcidBass	104	10	39	-
	MiniSub	104	6	40	-
	FatSineRes	104	11	39	-
	BalladBass	104	7	40	-
	VeloMaster	104	17	82	-
	MellowFinger	0	112	34	-
	VintagePickMute	104	0	35	Cool!
	VintageDyno	104	2	35	Cool!
	RockBass	0	114	35	-
	SuperFretless	0	113	36	-
	PickBass	0	112	35	-
	FusionBass	0	113	37	-
	Bass&Cymbal	0	114	33	-
	SubBass	0	114	40	-
	HardBass	0	114	39	-
	ResoBass	0	112	39	-
	HouseBass	0	116	39	-
	BigDrone	0	118	39	-
	FunkBass	0	112	38	-
	TB Bass	0	117	40	-
	VintageRound	8	1	18	MegaVoice
	VintageFlat	8	2	18	MegaVoice
	VintagePick	8	1	19	MegaVoice
	AcousticBass	8	0	17	MegaVoice
	ElectricBass	8	0	18	MegaVoice
	PickBass	8	0	19	MegaVoice

Category	Voice Name	Voice Number			Voice Type
		MSB	LSB	PRG	
Bass	FretlessBass	8	0	20	MegaVoice
Perc&Drum	Vibraphone	104	1	12	Sweet!
	Xylophone	104	0	14	-
	Marimba	104	0	13	-
	Glockenspiel	104	0	10	-
	Celesta	0	112	9	-
	JazzVibes	0	113	12	-
	Suspense	0	114	12	-
	SteelDrums	0	112	115	-
	MusicBox	0	112	11	-
	TubularBells	0	112	15	-
	Kalimba	0	112	109	-
	Dulcimer	0	112	16	-
	Timpani	0	112	48	-
	StackBell	104	8	89	-
	NiceBell	104	9	89	-
	RealDrums	127	0	92	Live!Drums
	RealBrushes	127	0	42	Live!Drums
	AcousticKit	127	0	90	Live!Drums
	RockKit	127	0	91	Live!Drums
	StudioKit	127	0	87	Live!Drums
	PowerKit1	127	0	88	Live!Drums
	PowerKit2	127	0	89	Live!Drums
	HouseKit	127	0	61	Drums
	DrumMachine	127	0	62	Drums
	AnalogT8Kit	127	0	59	Drums
	AnalogT9Kit	127	0	60	Drums
	BreakKit	127	0	58	Drums
	HipHopKit	127	0	57	Drums
	DanceKit	127	0	28	Drums
	AnalogKit	127	0	26	Drums
	JazzKit	127	0	33	Drums
	HitKit	127	0	5	Drums
	RoomKit	127	0	9	Drums
	ElectroKit	127	0	25	Drums
	SymphonyKit	127	0	49	Live!Drums
	TurkishKit	126	0	68	Live!SFX
	CubanKit	126	0	41	Live!SFX
	PopLatinKit	126	0	44	Live!SFX
	NewSFXKit1	126	0	3	Live!SFX
	NewSFXKit2	126	0	4	Live!SFX
	GospelAdLibs	126	0	111	Live!SFX
	VocalEffectsKit	126	0	110	Live!SFX
	NoisesKit	126	0	9	SFX Kit
	SeaShore	104	0	123	Live!
	Helicopter	104	0	126	Live!
	Applause1	104	0	127	Live!
	Applause2	104	1	127	Live!
	GunShot	104	0	128	Live!
Accordion	Harmonica	8	64	105	S.Articulation2!
	BluesHarp	8	65	105	S.Articulation2!
	FrenchMusette	0	119	22	-
	MasterAccord	0	118	22	-
	JazzAccordion	0	120	22	-
	TangoAccordion	0	114	24	-
	Cassotto	104	0	22	-
	FullRegister	104	2	22	-
	Steirisch	0	117	22	-
	Cajun	104	3	22	-
	Harmonica	0	112	23	Sweet!
	Clari8'&4'	104	1	22	-
	Bandoneon	0	113	24	-
	MasterBass	0	122	22	-
	MusetteBass	0	123	22	-
	AccordionBass	0	121	22	-
	TangoBass	0	115	24	-
	FullRegBass	104	5	22	-
	CajunBass	104	6	22	-
Pad	NewHeaven	104	10	89	-
	FantasyBells	104	11	89	-
	ItopiaBells	104	13	89	-
	Sinesphere	104	18	89	-
	SpectrumTheme	104	14	89	-
	HeavenPad	104	3	92	-
	BreathBells	104	15	89	-
	NextGeneration	104	9	52	-
	OrganBells	104	12	89	-
	SkyBells	104	16	89	-
	WaterGames	104	4	102	-
	MyGeneration	104	5	102	-
	All or Nothing	104	6	102	-
	RainyDay	104	5	90	-
	Digisweeper	104	7	102	-
	WarpedWaves	104	2	95	-
	SoundPictures	104	3	95	-
	Spectralis	104	4	95	-
	MetallicRain	104	8	102	-

Category	Voice Name	Voice Number			Voice Type
		MSB	LSB	PRG	
Pad	AmbientTheme	104	20	89	-
	ReflectingZone	104	21	89	-
	TheFog	104	9	102	-
	SpectrumPad	104	5	95	-
	MysticPad	104	6	95	-
	HybridPad	104	22	89	-
	DeepMotion	104	4	96	-
	Randomizer	104	10	102	-
	Atlantis	104	11	102	-
	Tric-Trac	104	2	98	-
	WhisperGallery	104	0	93	-
	FlyingHarmonics	104	1	100	-
	NylonHeaven	104	2	100	-
	PianoSweeper	104	3	100	-
	AiryHarp	104	17	89	-
	HybridLines	104	4	92	-
	MidnightSpecial	104	3	102	-
	Atmo5th	104	6	90	-
	PadVoices	104	6	96	Live!
	SixthSense	104	2	102	-
	Skydiver	0	112	102	-
	CrossPhase	104	1	102	-
	GalaxyPad	104	3	89	-
	NightMotion	104	4	89	-
	MorningDew	104	0	95	-
	Aerosphere	104	1	95	-
	NewAtmosphere	104	4	90	-
	VPSoft	104	0	90	-
	HotSwell	104	2	96	-
	DarkFatSaw	104	2	90	-
	VaporPad	104	1	90	-
	SpaceRider	104	1	96	-
	PearlsPad	104	2	89	-
	BreathPad	104	0	92	-
	NobleMan	104	1	89	-
	DouxFlange	104	3	96	-
	LightPad	104	2	52	-
	ButterStrings	104	2	51	-
	MediumTunePad	104	0	51	-
	NylonPad	104	0	100	-
	DarkLight	104	3	90	-
	AnaDayz	104	3	52	-
	BrightPadTrance	104	4	91	-
	OctStrings	104	4	51	-
	ChillinChords	104	6	52	-
	BrightPopPad	104	3	51	-
	PremiumPad	104	0	52	-
	SoftEnsemble	104	1	51	-
	80'sPad	104	1	52	-
	BrightPadClassic	104	3	91	-
	AmbientPad	104	0	89	-
	BrightFatSaw	104	5	91	-
	TranceMW	104	0	96	-
	EarlyDigital	104	0	94	-
	Bellsphere	104	5	89	-
	PercPad	104	0	102	-
	SuperDarkPad	0	119	90	-
	AnalogPad	0	120	90	-
	DarkAngelPad	0	121	90	-
	LitePad	0	122	90	-
	PopPad	0	112	91	-
	GloriousPhase	0	114	91	-
	AnalogSwell	0	119	96	-
	HipaStrings	0	114	96	-
	BrightSawPad	0	113	91	-
	BigOctavePad	0	115	91	-
	GoldenAge	0	115	89	-
	Solaris	0	114	95	-
	Insomnia	0	113	95	-
	Mediterrain	0	114	100	-
	OberSweep	0	115	96	-
	TimeTravel	0	116	89	-
	Bubblespace	0	113	102	-
	MellowPad	0	117	96	-
	NeoWarmPad	0	115	90	-
	CyberPad	0	113	100	-
	BrightOber	0	113	96	-
	DarkPad	0	118	96	-
Synth	ClubLead	104	3	63	-
	HPFDance	104	0	91	-
	DetunedSawOct	104	8	82	-
	DancyHook	104	9	82	-
	VinalogSaw	104	3	82	-
	TalkModLead	104	0	88	-
	SubLead	104	0	81	-
	SoftSaw	104	16	82	-
	FusionLead	104	15	82	-

Category	Voice Name	Voice Number			Voice Type
		MSB	LSB	PRG	
Synth	1984Synth	104	20	82	-
	Oxygen	0	122	82	-
	Matrix	0	123	82	-
	WireLead	0	120	82	-
	SoftR&B	0	119	81	-
	EarlyLead	0	118	82	-
	LektroCodes	104	2	85	-
	SimpleComp	104	12	82	-
	BalladComp	104	6	89	-
	HeavenBell	104	0	101	-
	BrightPadBell	104	7	89	-
	SoftSquare	104	5	81	-
	WildPWM	104	4	81	-
	DetunedVintage	104	1	85	-
	PWMLead	104	1	82	-
	BrassyLead	104	5	63	-
	PunchLead	104	7	82	-
	FlangeFilter	104	2	82	-
	MouthLead	104	0	82	-
	ResonantClavi	104	2	91	-
	ResonanceComp	104	4	63	-
	TrancePerc	104	5	82	-
	Chordmaster	104	13	82	-
	DigitalSeq	104	2	88	-
	AnalogSeq	104	3	88	-
	TranceSeq1	104	4	88	-
	TranceSeq2	104	5	88	-
	TranceSeq3	104	1	91	-
	PercSeqFS	104	6	88	-
	PercSeqFM1	104	7	88	-
	PercSeqFM2	104	8	88	-
	SynthSticks	104	0	107	-
	SazFeeze	104	0	98	-
	EasternAir	104	1	98	-
	Xtune	104	1	88	-
	PitchFall	104	0	104	-
	PercSeqSaw	104	11	82	-
	PercSeqHipa	104	9	88	-
	Attack	104	4	82	-
	PWMPercussion	104	6	82	-
	Nomad	104	1	105	-
	ChorusSawLead	104	10	82	-
	FaaatComp	104	4	52	-
	FatSawHook	104	7	52	-
	TechGlide	104	14	82	-
	DanceChords	104	5	52	-
	DanceHook	0	112	87	-
	OctaveHook	0	113	87	-
	HipaLead	0	118	85	-
	PunchyHook	0	127	82	-
	CryingLead	0	114	88	-
	HipLead	0	113	81	-
	HopLead	0	117	81	-
	TechLead	0	117	85	-
	Tekkline	0	116	85	-
	SoftMini	0	124	81	-
	TranceLead	0	121	81	-
	FireWire	0	116	82	-
	Analogon	0	115	82	-
	Skyline	0	115	85	-
	BleepLead	104	0	85	-
OrganFlutes	OrganFlutes	0	126	17	OrganFlutes
	USDSmile	0	126	17	OrganFlutes
	ReggaeBars	0	126	17	OrganFlutes
	WarmTheatre	0	126	17	OrganFlutes
	OrganPops	0	126	17	OrganFlutes
	RockOrgan	0	126	17	OrganFlutes
	SoulPercussion	0	126	17	OrganFlutes
	GospelTruth	0	126	17	OrganFlutes
	PadOrgan	0	126	17	OrganFlutes
	FullOrgan	0	126	17	OrganFlutes
	StringBars	0	126	17	OrganFlutes
	LatinSpin	0	126	17	OrganFlutes
	ShadyBars	0	126	17	OrganFlutes
	FunkOrgan	0	126	17	OrganFlutes
	BalladOrgan	0	126	17	OrganFlutes
	RichBars	0	126	17	OrganFlutes
	TrumpetBars	0	126	17	OrganFlutes
	SoulBars	0	126	17	OrganFlutes
	ClariBars	0	126	17	OrganFlutes
	JazzSquabble	0	126	17	OrganFlutes
	EuroPerc	0	126	17	OrganFlutes
	BalladEuro	0	126	17	OrganFlutes
	EuroReeds	0	126	17	OrganFlutes
	EvenWarmth	0	126	17	OrganFlutes
	BrightEuro	0	126	17	OrganFlutes
	EuroPops	0	126	17	OrganFlutes

Category	Voice Name	Voice Number			Voice Type
		MSB	LSB	PRG	
OrganFlutes	FullEuro	0	126	17	OrganFlutes
	EuroAccomp1	0	126	17	OrganFlutes
	EuroAccomp2	0	126	17	OrganFlutes
	EuroAccomp3	0	126	17	OrganFlutes

Legacy Voice

Category	Voice Name	Voice Number			Voice Type
		MSB	LSB	PRG	
Piano	BalladStack	0	114	3	-
	MIDIGrand	0	112	3	-
	Harpsichord	0	112	7	Live!
	ConcertGrand	0	115	1	Live!
	PopGrand	104	5	1	Live!
	RockPiano	104	4	1	Live!
	AmbientPiano	104	3	1	Live!
	CocktailPiano	104	0	4	Live!
	MIDIGrand	104	0	3	Live!
	MIDIGrandPad	104	1	3	Live!
	MIDIGrandSyn	104	1	1	Live!
	PianoOrchestra	104	2	1	Live!
	OctavePiano1	0	113	4	Live!
	OctavePiano2	0	114	4	Live!
E.Piano	JazzChorus	0	118	6	-
	HyperTines	0	113	6	-
	VenusEP	0	114	6	-
	SuperDX	0	117	6	-
	PolarisEP	0	115	5	-
	DX Modern	0	112	6	-
	NewTines	0	116	6	-
	PhaseEP	0	120	5	-
	ModernEP	0	115	6	-
	FunkEP	0	112	5	-
	ChorusBell	0	120	6	-
	StereoClavi	0	114	8	-
Organ	DanceOrgan	0	113	18	-
	ClickOrgan	0	112	18	-
	ReedOrgan	0	112	21	-
	RotarySwitch	0	110	18	Cool!
	RotaryDrive	0	116	19	-
	FullRocker2	104	3	19	Cool!
	GospelOrgan	0	119	17	-
	PurpleOrgan	0	114	19	-
	RockOrgan1	0	112	19	-
	RockOrgan2	0	119	19	-
	RockOrgan3	0	113	19	-
	60'sOrgan	0	116	18	-
	JazzOrgan1	0	112	17	-
	JazzOrgan2	0	113	17	-
	JazzOrgan3	0	120	17	-
	DrawbarOrgan1	0	120	18	-
	DrawbarOrgan2	0	115	17	-
	BrightDraw	0	116	17	-
	PercOrgan	0	119	18	-
	ElectricOrgan	0	118	18	-
	Tibia 8&4 Acmp	0	122	17	-
	Tibia 16&4 Acmp	0	114	17	-
	Tibia Full Acmp	0	114	18	-
	Tibia 8 Acmp	0	122	18	-
	Vox 8 Acmp	0	123	18	-
	Vox&Tibia Acmp	0	125	17	-
Strings	SlowStrings	0	113	50	-
	StringFalls	0	121	49	Live!
	AnalogStrings	0	112	52	-
	TremoloBowing2	8	35	49	S.Articulation!
	Strings	0	112	49	-
	OrchStrings	0	113	49	-
	Symphonic	0	114	49	-
	ConcertoStrings	0	115	49	-
	BowStrings	0	116	49	-
	TremoloStrings	0	112	45	-
	Pizzicato	0	112	46	-
	Orchestra	0	116	50	Live!
	Orch&Flute	0	119	50	-
	Orch&Oboe	0	121	50	-
	Orch&Horns	0	118	50	-
	Marcato	0	115	50	-
	StringQuartet	0	114	50	-
	Harp	0	112	47	-
	Hackbrett2	0	113	47	-
	Banjo2	0	112	106	-
	Sitar2	0	112	105	-
	JazzViolinStyle	8	80	49	S.Articulation2!
	CelticViolinStyle	8	81	49	S.Articulation2!
Choir	Voices	0	113	55	-
	Choir	0	112	53	-
	AirChoir	0	112	55	-
	VoxHumana	0	112	54	-
	GospelVoices	0	116	53	Live!
	Humming	0	118	53	Live!
	HahChoir	0	114	53	-
	SweetHeaven	0	118	89	-
	DreamHeaven	0	121	89	-
	Sunbeam	0	123	89	-
	BellHeaven	0	119	89	-
	PanHeaven	0	120	89	-

Category	Voice Name	Voice Number			Voice Type
		MSB	LSB	PRG	
Choir	ProHeaven	0	122	89	-
	UuhChoir	0	115	53	-
	HahPad	0	116	95	-
	BoysChoirAah	104	8	53	Live!
	BoysChoirOoh	104	8	54	Live!
Brass	BrassShake2	8	33	57	S.Articulation!
	SoftBrass	0	123	62	-
	Sforzando	0	125	62	-
	SmallBrass	0	117	62	-
	BrassSection	0	112	62	-
	HybridComp	0	119	63	-
	NaturalBrass	0	124	62	-
	BrightBrass	0	120	62	-
	Hybrihorn	0	113	61	-
	HighBrass	0	115	62	-
	BigBandBrass	0	113	62	-
	PopBrass	0	118	62	-
	BrassCombo	0	115	67	-
	BreathBrass	0	116	61	-
	BigBrass	0	121	62	-
	MellowBrass	0	116	62	-
	Hybripad	0	114	61	-
	FullHorns	0	114	62	-
	SmoothTrombone	0	118	58	-
	TrumpetEns	0	122	62	-
	MellowHorns	0	119	62	-
	BrassHit	0	126	62	-
	SynthBrass	0	112	63	-
	TbnSection	0	113	58	-
	FrenchHorns	0	112	61	Live!
	SymphonyBrass	0	119	61	Live!
	SymphonyHorns	0	115	61	Live!
Trumpet	TrumpetShake2	8	36	65	S.Articulation!
	MutedTrumpet	0	112	60	-
	FlugelHorn	0	113	57	-
	SoloTrombone	0	112	58	-
	JazzTrumpet	0	116	57	-
	Trombone	0	116	58	-
	SoftTrombone	0	115	58	-
	SoloTrumpet	0	112	57	-
	MellowTrombone	0	114	58	-
	Tuba2	0	112	59	-
	JazzTrpStyle	8	80	66	S.Articulation2!
	ClassicTrpStyle	8	81	66	S.Articulation2!
Saxophone	RockSax2	8	34	83	S.Articulation!
	GrowlSax	0	118	67	-
	SopranoSax	0	112	65	-
	AltoSax	0	112	66	-
	TenorSax	0	112	67	-
	SaxStack	0	124	67	-
	WoodwindsEns	0	113	67	-
	SaxyMood	0	120	67	-
	JazzSaxStyle	8	81	81	S.Articulation2!
	BreathySaxStyle	8	80	81	S.Articulation2!
	PopSprStyle	8	80	85	S.Articulation2!
	BalladSprStyle	8	81	85	S.Articulation2!
	AltoSax	0	114	66	Sweet!
	BaritoneSax	0	112	68	-
Flute&Clarinet	EnglishHorn	0	112	70	-
	Bassoon	0	112	71	-
	Flute	0	112	74	-
	Clarinet	0	112	72	-
	Oboe	0	112	69	-
	PanFlute	0	113	74	-
	EthnicFlute	0	112	76	-
	ClarinetStyle	8	81	93	S.Articulation2!
	BalladClrStyle	8	80	93	S.Articulation2!
	RomanceClrStyle	8	82	93	S.Articulation2!
	IrishPipeAirStyle	8	80	109	S.Articulation2!
	IrishPipeDceStyle	8	81	109	S.Articulation2!
	OrchFlute	104	0	74	Sweet!
	OrchOboe	104	0	69	Sweet!
Guitar	FolkGuitar	0	112	26	-
	MutedGuitar	0	112	29	-
	FunkGuitar	0	113	29	-
	SolidChord	0	121	28	-
	SolidGuitar	0	118	28	-
	CampfireGtr	0	115	26	-
	Electric12Str	0	119	28	-
	DXJazzGuitar	0	117	27	-
	SmoothLead	0	119	27	-
	PowerChord	0	117	31	-
	RockGuitar	0	116	30	-
	VodooLead	0	116	31	-
	TremoloGuitar	0	113	28	-
	WahGuitar	0	122	28	-
	LeadGuitar	0	114	30	-

Category	Voice Name	Voice Number			Voice Type
		MSB	LSB	PRG	
Guitar	18String	0	119	26	-
	ChorusGuitar	0	124	28	-
	VintageTrem	0	120	28	-
	DeepChorus	0	114	28	-
	BrightClean	0	116	28	-
	DistortionGtr	0	112	31	-
	OverdriveGtr	0	112	30	-
	FeedbackGtr	0	113	30	-
	VintageAmp	8	40	4	S.Articulation!
Bass	ClickBass	0	115	39	-
	PunchyBass	0	117	39	-
	AnalogBass	0	112	40	-
	DX FunkBass	0	113	38	-
	DrySynthBass	0	116	40	-
	80'sSynthBass	0	115	40	-
	HiQBass	0	113	39	-
	AcousticBass	0	112	33	-
Perc&Drum	StandardKit1	127	0	1	Live!Drums
	StandardKit2	127	0	2	Live!Drums
	RockKit	127	0	17	Drums
	ArabicKit	126	0	36	SFX Kit
	Vibraphone	0	112	12	-
	Marimba	0	112	13	-
	Xylophone	0	112	14	-
	Glockenspiel	0	112	10	-
	BrushKit	127	0	41	Live!Drums
	SFX Kit1	126	0	1	SFX Kit
	SFX Kit2	126	0	2	SFX Kit
Accordion	Accordion	0	116	22	-
	SmallAccordion	0	115	22	-
	ModernHarp	0	113	23	-
	BluesHarp	0	114	23	-
	BallroomAcc	0	112	24	-
	SoftAccordion	0	114	22	-
	TuttiAccordion	0	113	22	-
	Musette	0	112	22	-
	HarmonicaStyle	8	80	105	S.Articulation2!
	BluesHarpStyle	8	81	105	S.Articulation2!
Pad	PsychoPad	0	118	102	-
	FarEast	0	112	98	-
	Disclosure	0	116	90	-
	Mystery	0	113	98	-
	Sirius	0	114	102	-
	S&H Groove	0	115	102	-
	VeloAshrami	0	116	102	-
	EveningStars	0	117	102	-
	AngelVibes	0	114	99	-
	GlassPad	0	114	94	-
	DX Pad	0	112	93	-
	Symbiont	0	113	89	-
	DarkMoon	0	113	90	-
	Ionosphere	0	115	95	-
	Millennium	0	117	89	-
	Atmosphere	0	112	100	-
	Equinox	0	112	95	-
	Fantasia	0	112	89	-
	Stargate	0	114	89	-
	Area51	0	112	90	-
	DigitalPad	0	115	94	-
	Dunes	0	114	90	-
	Messenger	0	116	96	-
	Wave2001	0	112	96	-
	XenonPad	0	112	92	-
	MagicBell	8	32	121	S.Articulation!
Synth	ProLead	0	113	84	-
	FunkyLead	0	121	82	-
	Portatone	0	112	85	-
	Adrenaline	0	113	85	-
	Stardust	0	112	99	-
	AeroLead	0	112	84	-
	MiniLead	0	114	81	-
	SunBell	0	113	99	-
	HiBias	0	116	81	-
	VinylLead	0	115	81	-
	PanLead	0	122	81	-
	StringBells	0	124	89	-
	Padbells	0	126	89	-
	BigTune	0	118	90	-
	TrumpetSaw	0	125	82	-
	Paraglide	0	114	85	-
	Robolead	0	124	82	-
	Fargo	0	119	82	-
	BigLead	0	113	82	-
	Warp	0	117	82	-
	Impact	0	113	88	-
	UnderHeim	0	112	88	-
	CrystalEyes	0	125	89	-

Category	Voice Name	Voice Number			Voice Type
		MSB	LSB	PRG	
Synth	MelodyMaker	0	117	90	-
	AttackSaw	0	126	82	-
	PercSquare	0	123	81	-
	SquareLead	0	112	81	-
	SawLead	0	112	82	-
	PopLead	0	120	81	-
	BrightMini	0	125	81	-
	OrbitSine	0	126	81	-
	Blaster	0	114	82	-
	TinyLead	0	118	81	-

GM & XG

Category	Voice Name	Voice Number			Voice Type
		MSB	LSB	PRG	
Piano	GrandPiano	0	0	1	-
	GrndPianoKSP	0	1	1	-
	MellowGrPno	0	18	1	-
	PianoStrings	0	40	1	-
	Dream	0	41	1	-
	BrightPiano	0	0	2	-
	BritePnoKSP	0	1	2	-
	ElecGrandPno	0	0	3	-
	ElecGrPnoKSP	0	1	3	-
	DetunedCP80	0	32	3	-
	LayeredCP1	0	40	3	-
	LayeredCP2	0	41	3	-
	Honkytonk	0	0	4	-
	HonkytonkKSP	0	1	4	-
	El.Piano1	0	0	5	-
	El.Piano1KSP	0	1	5	-
	MellowEP1	0	18	5	-
	ChorusEP1	0	32	5	-
	HardEl.Piano	0	40	5	-
	VXfadeEl.P1	0	45	5	-
	60sEl.Piano1	0	64	5	-
	El.Piano2	0	0	6	-
	El.Piano2KSP	0	1	6	-
	ChorusEP2	0	32	6	-
	DXEPHard	0	33	6	-
	DXLegend	0	34	6	-
	DXPhaseEP	0	40	6	-
	DX+AnalogEP	0	41	6	-
	DXKotoEP	0	42	6	-
	VXfadeEl.P2	0	45	6	-
	Harpsichord	0	0	7	-
	Harpsi.KSP	0	1	7	-
	Harpsichord2	0	25	7	-
	Harpsichord3	0	35	7	-
	Clavi.	0	0	8	-
	Clavi.KSP	0	1	8	-
	Clavi.Wah	0	27	8	-
	PulseClavi.	0	64	8	-
	PierceClavi.	0	65	8	-
ChromaticPerc	Celesta	0	0	9	-
	Glockenspiel	0	0	10	-
	MusicBox	0	0	11	-
	Orgel	0	64	11	-
	Vibraphone	0	0	12	-
	VibesKSP	0	1	12	-
	HardVibes	0	45	12	-
	Marimba	0	0	13	-
	MarimbaKSP	0	1	13	-
	SineMarimba	0	64	13	-
	Balimba	0	97	13	-
	LogDrums	0	98	13	-
	Xylophone	0	0	14	-
	TubularBells	0	0	15	-
	ChurchBells	0	96	15	-
	Carillon	0	97	15	-
	Dulcimer	0	0	16	-
	Dulcimer2	0	35	16	-
	Cimbalom	0	96	16	-
	Santur	0	97	16	-
Organ	DrawbarOrgan	0	0	17	-
	DetDrawOrgan	0	32	17	-
	60sDrawOrg1	0	33	17	-
	60sDrawOrg2	0	34	17	-
	70sDrawOrg1	0	35	17	-
	DrawbarOrg2	0	36	17	-
	60sDrawOrg3	0	37	17	-
	EvenBarOrg	0	38	17	-
	16+2'2_3Org	0	40	17	-
	OrganBass	0	64	17	-
	70sDrawOrg2	0	65	17	-
	CheezyOrgan	0	66	17	-
	DrawbarOrg3	0	67	17	-
	Perc.Organ	0	0	18	-
	70sPercOrg1	0	24	18	-
	DetPercOrgan	0	32	18	-
	LightOrgan	0	33	18	-
	Perc.Organ2	0	37	18	-
	RockOrgan	0	0	19	-
	RotaryOrgan	0	64	19	-
	SlowRotary	0	65	19	-
	FastRotary	0	66	19	-
	ChurchOrgan	0	0	20	-
	ChurchOrgan3	0	32	20	-
	ChurchOrgan2	0	35	20	-
	NotreDame	0	40	20	-
	OrganFlute	0	64	20	-
	Trem.OrganFl	0	65	20	-

Category	Voice Name	Voice Number			Voice Type
		MSB	LSB	PRG	
Organ	ReedOrgan	0	0	21	-
	PuffOrgan	0	40	21	-
	Accordion	0	0	22	-
	AccordIt	0	32	22	-
	Harmonica	0	0	23	-
	Harmonica2	0	32	23	-
	TangoAccord	0	0	24	-
	TangoAccord2	0	64	24	-
Guitar	NylonGuitar	0	0	25	-
	NylonGuitar2	0	16	25	-
	NylonGuitar3	0	25	25	-
	VelGtrHarmo	0	43	25	-
	Ukulele	0	96	25	-
	SteelGuitar	0	0	26	-
	SteelGuitar2	0	16	26	-
	12StrGuitar	0	35	26	-
	Nylon&Steel	0	40	26	-
	Steel&Body	0	41	26	-
	Mandolin	0	96	26	-
	JazzGuitar	0	0	27	-
	MellowGuitar	0	18	27	-
	JazzAmp	0	32	27	-
	CleanGuitar	0	0	28	-
	ChorusGuitar	0	32	28	-
	MutedGuitar	0	0	29	-
	FunkGuitar1	0	40	29	-
	MuteSteelGtr	0	41	29	-
	FunkGuitar2	0	43	29	-
	JazzMan	0	45	29	-
	Overdriven	0	0	30	-
	GuitarPinch	0	43	30	-
	Distortion	0	0	31	-
	FeedbackGtr	0	40	31	-
	FeedbackGtr2	0	41	31	-
	GtrHarmonics	0	0	32	-
	GtrFeedback	0	65	32	-
	GtrHarmonic2	0	66	32	-
Bass	AcousticBass	0	0	33	-
	JazzRhythm	0	40	33	-
	VXUprghtBass	0	45	33	-
	FingerBass	0	0	34	-
	FingerDark	0	18	34	-
	FlangeBass	0	27	34	-
	Bass&DistEG	0	40	34	-
	FingerSlap	0	43	34	-
	FingerBass2	0	45	34	-
	Mod.Bass	0	65	34	-
	PickBass	0	0	35	-
	MutePickBass	0	28	35	-
	FretlessBass	0	0	36	-
	Fretless2	0	32	36	-
	Fretless3	0	33	36	-
	Fretless4	0	34	36	-
	Syn.Fretless	0	96	36	-
	SmthFretless	0	97	36	-
	SlapBass1	0	0	37	-
	ResonantSlap	0	27	37	-
	PunchThumb	0	32	37	-
	SlapBass2	0	0	38	-
	Velo.Sw.Slap	0	43	38	-
	SynthBass1	0	0	39	-
	SynBass1Dark	0	18	39	-
	FastResoBass	0	20	39	-
	AcidBass	0	24	39	-
	ClaviBass	0	35	39	-
	TechnoBass	0	40	39	-
	Orbiter	0	64	39	-
	SquareBass	0	65	39	-
	RubberBass	0	66	39	-
	Hammer	0	96	39	-
	SynthBass2	0	0	40	-
	MellowSyBass	0	6	40	-
	SequenceBass	0	12	40	-
	ClickSynBass	0	18	40	-
	SynBass2Dark	0	19	40	-
	SmoothSyBass	0	32	40	-
	ModulrSyBass	0	40	40	-
	DXBass	0	41	40	-
	XWireBass	0	64	40	-
Strings	Violin	0	0	41	-
	SlwAtkViolin	0	8	41	-
	Viola	0	0	42	-
	Cello	0	0	43	-
	Contrabass	0	0	44	-
	Trem.Strings	0	0	45	-
	SlwAtTremStr	0	8	45	-
	SuspenseStr	0	40	45	-

Category	Voice Name	Voice Number			Voice Type
		MSB	LSB	PRG	
Strings	PizzicatoStr	0	0	46	-
	Orch.Harp	0	0	47	-
	YangChin	0	40	47	-
	Timpani	0	0	48	-
Ensemble	Strings1	0	0	49	-
	StereoStrngs	0	3	49	-
	SlwAtkStrngs	0	8	49	-
	ArcoStrings	0	24	49	-
	60'sStrings	0	35	49	-
	Orchestra	0	40	49	-
	Orchestra2	0	41	49	-
	TremOrchstra	0	42	49	-
	Velo.Strings	0	45	49	-
	Strings2	0	0	50	-
	S.SlowStrngs	0	3	50	-
	LegatoStrngs	0	8	50	-
	WarmStrings	0	40	50	-
	Kingdom	0	41	50	-
	70'sStrings	0	64	50	-
	Strings3	0	65	50	-
	SynStrings1	0	0	51	-
	ResoStrings	0	27	51	-
	SynStrings4	0	64	51	-
	SynStrings5	0	65	51	-
	SynStrings2	0	0	52	-
	ChoirAahs	0	0	53	-
	StereoChoir	0	3	53	-
	ChoirAahs2	0	16	53	-
	MellowChoir	0	32	53	-
	ChoirStrings	0	40	53	-
	VoiceOohs	0	0	54	-
	SynthVoice	0	0	55	-
	SynthVoice2	0	40	55	-
	Choral	0	41	55	-
	AnalogVoice	0	64	55	-
	OrchestraHit	0	0	56	-
	OrchestrHit2	0	35	56	-
	Impact	0	64	56	-
Brass	Trumpet	0	0	57	-
	Trumpet2	0	16	57	-
	BriteTrumpet	0	17	57	-
	WarmTrumpet	0	32	57	-
	Trombone	0	0	58	-
	Trombone2	0	18	58	-
	Tuba	0	0	59	-
	Tuba2	0	16	59	-
	MutedTrumpet	0	0	60	-
	FrenchHorn	0	0	61	-
	Fr.HornSolo	0	6	61	-
	FrenchHorn2	0	32	61	-
	HornOrchestr	0	37	61	-
	BrassSection	0	0	62	-
	Tp&TbSection	0	35	62	-
	BrassSect2	0	40	62	-
	HighBrass	0	41	62	-
	MellowBrass	0	42	62	-
	SynthBrass1	0	0	63	-
	QuackBrass	0	12	63	-
	ResoSynBrass	0	20	63	-
	PolyBrass	0	24	63	-
	SynthBrass3	0	27	63	-
	JumpBrass	0	32	63	-
	AnaVelBrass1	0	45	63	-
	AnalogBrass1	0	64	63	-
	SynthBrass2	0	0	64	-
	SoftBrass	0	18	64	-
	SynthBrass4	0	40	64	-
	ChoirBrass	0	41	64	-
	AnaVelBrass2	0	45	64	-
	AnalogBrass2	0	64	64	-
Reed	SopranoSax	0	0	65	-
	AltoSax	0	0	66	-
	SaxSection	0	40	66	-
	HyperAltoSax	0	43	66	-
	TenorSax	0	0	67	-
	BreathyTenor	0	40	67	-
	SoftTenorSax	0	41	67	-
	TenorSax2	0	64	67	-
	BaritoneSax	0	0	68	-
	Oboe	0	0	69	-
	EnglishHorn	0	0	70	-
	Bassoon	0	0	71	-
	Clarinet	0	0	72	-
Pipe	Piccolo	0	0	73	-
	Flute	0	0	74	-
	Recorder	0	0	75	-
	PanFlute	0	0	76	-

Category	Voice Name	Voice Number			Voice Type
		MSB	LSB	PRG	
Pipe	BlownBottle	0	0	77	-
	Shakuhachi	0	0	78	-
	Whistle	0	0	79	-
	Ocarina	0	0	80	-
Synth.Lead	SquareLead	0	0	81	-
	SquareLead2	0	6	81	-
	LMSquare	0	8	81	-
	Hollow	0	18	81	-
	Shroud	0	19	81	-
	Mellow	0	64	81	-
	SoloSine	0	65	81	-
	SineLead	0	66	81	-
	SawtoothLead	0	0	82	-
	SawtoothLd2	0	6	82	-
	ThickSaw	0	8	82	-
	DynamicSaw	0	18	82	-
	DigitalSaw	0	19	82	-
	BigLead	0	20	82	-
	HeavySynth	0	24	82	-
	WaspySynth	0	25	82	-
	PulseSaw	0	40	82	-
	Dr.Lead	0	41	82	-
	VelocityLead	0	45	82	-
	Seq.Analog	0	96	82	-
	CalliopeLead	0	0	83	-
	PureLead	0	65	83	-
	ChiffLead	0	0	84	-
	Rubby	0	64	84	-
	CharangLead	0	0	85	-
	DistortedLd	0	64	85	-
	WireLead	0	65	85	-
	VoiceLead	0	0	86	-
	SynthAahs	0	24	86	-
	VoxLead	0	64	86	-
	FifthsLead	0	0	87	-
	BigFive	0	35	87	-
	Bass&Lead	0	0	88	-
	Big&Low	0	16	88	-
	Fat&Perky	0	64	88	-
	SoftWhirl	0	65	88	-
Synth.Pad	NewAgePad	0	0	89	-
	Fantasy	0	64	89	-
	WarmPad	0	0	90	-
	ThickPad	0	16	90	-
	SoftPad	0	17	90	-
	SinePad	0	18	90	-
	HornPad	0	64	90	-
	RotaryStrngs	0	65	90	-
	PolySynthPad	0	0	91	-
	PolyPad80	0	64	91	-
	ClickPad	0	65	91	-
	AnalogPad	0	66	91	-
	SquarePad	0	67	91	-
	ChoirPad	0	0	92	-
	Heaven	0	64	92	-
	Itopia	0	66	92	-
	CCPad	0	67	92	-
	BowedPad	0	0	93	-
	Glacier	0	64	93	-
	GlassPad	0	65	93	-
	MetallicPad	0	0	94	-
	TinePad	0	64	94	-
	PanPad	0	65	94	-
	HaloPad	0	0	95	-
	SweepPad	0	0	96	-
	Shwimmer	0	20	96	-
	Converge	0	27	96	-
	PolarPad	0	64	96	-
	Celestial	0	66	96	-
Synth.Effect	Rain	0	0	97	-
	ClaviPad	0	45	97	-
	HarmoRain	0	64	97	-
	AfricanWind	0	65	97	-
	Carib	0	66	97	-
	SoundTrack	0	0	98	-
	Prologue	0	27	98	-
	Ancestral	0	64	98	-
	Crystal	0	0	99	-
	SynthDr.Comp	0	12	99	-
	Popcorn	0	14	99	-
	TinyBells	0	18	99	-
	RoundGlocken	0	35	99	-
	GlockenChime	0	40	99	-
	ClearBells	0	41	99	-
	ChorusBells	0	42	99	-
	SynthMallet	0	64	99	-
	SoftCrystal	0	65	99	-

Category	Voice Name	Voice Number			Voice Type
		MSB	LSB	PRG	
Synth.Effect	LoudGlocken	0	66	99	-
	ChristmasBel	0	67	99	-
	VibeBells	0	68	99	-
	DigitalBells	0	69	99	-
	AirBells	0	70	99	-
	BellHarp	0	71	99	-
	Gamelimba	0	72	99	-
	Atmosphere	0	0	100	-
	WarmAtmos.	0	18	100	-
	HollwRelease	0	19	100	-
	NylonElPiano	0	40	100	-
	NylonHarp	0	64	100	-
	HarpVox	0	65	100	-
	Atmos.Pad	0	66	100	-
	Planet	0	67	100	-
	Brightness	0	0	101	-
	FantasyBells	0	64	101	-
	Smokey	0	96	101	-
	Goblins	0	0	102	-
	GoblinsSynth	0	64	102	-
	Creeper	0	65	102	-
	RingPad	0	66	102	-
	Ritual	0	67	102	-
	ToHeaven	0	68	102	-
	Night	0	70	102	-
	Glisten	0	71	102	-
	BellChoir	0	96	102	-
	Echoes	0	0	103	-
	Echoes2	0	8	103	-
	EchoPan	0	14	103	-
	EchoBells	0	64	103	-
	BigPan	0	65	103	-
	SynthPiano	0	66	103	-
	Creation	0	67	103	-
	StarDust	0	68	103	-
	Reso&Panning	0	69	103	-
	Sci-Fi	0	0	104	-
	Starz	0	64	104	-
Ethnic	Sitar	0	0	105	-
	DetunedSitar	0	32	105	-
	Sitar2	0	35	105	-
	Tambra	0	96	105	-
	Tamboura	0	97	105	-
	Banjo	0	0	106	-
	MutedBanjo	0	28	106	-
	Rabab	0	96	106	-
	Gopichant	0	97	106	-
	Oud	0	98	106	-
	Shamisen	0	0	107	-
	Koto	0	0	108	-
	Taisho-kin	0	96	108	-
	Kanoon	0	97	108	-
	Kalimba	0	0	109	-
	Bagpipe	0	0	110	-
	Fiddle	0	0	111	-
	Shanai	0	0	112	-
	Shanai2	0	64	112	-
	Pungi	0	96	112	-
	Hichiriki	0	97	112	-
Percussive	TinkleBell	0	0	113	-
	Bonang	0	96	113	-
	Altair	0	97	113	-
	GamelanGongs	0	98	113	-
	StereoGamlan	0	99	113	-
	RamaCymbal	0	100	113	-
	AsianBells	0	101	113	-
	Agogo	0	0	114	-
	SteelDrums	0	0	115	-
	GlassPerc.	0	97	115	-
	ThaiBells	0	98	115	-
	Woodblock	0	0	116	-
	Castanets	0	96	116	-
	TaikoDrum	0	0	117	-
	GranCassa	0	96	117	-
	MelodicTom	0	0	118	-
	MelodicTom2	0	64	118	-
	RealTom	0	65	118	-
	RockTom	0	66	118	-
	SynthDrum	0	0	119	-
	AnalogTom	0	64	119	-
	ElectroPerc.	0	65	119	-
	Rev.Cymbal	0	0	120	-
SoundEffect	GtrFretNoise	0	0	121	-
	BreathNoise	0	0	122	-
	Seashore	0	0	123	-
	BirdTweet	0	0	124	-
	TelephonRing	0	0	125	-

Category	Voice Name	Voice Number			Voice Type
		MSB	LSB	PRG	
SoundEffect	Helicopter	0	0	126	-
	Applause	0	0	127	-
	Gunshot	0	0	128	-
	CuttingNoise	64	0	1	-
	CuttingNoiz2	64	0	2	-
	StringSlap	64	0	4	-
	Fl.KeyClick	64	0	17	-
	Shower	64	0	33	-
	Thunder	64	0	34	-
	Wind	64	0	35	-
	Stream	64	0	36	-
	Bubble	64	0	37	-
	Feed	64	0	38	-
	Dog	64	0	49	-
	Horse	64	0	50	-
	BirdTweet2	64	0	51	-
	Ghost	64	0	55	-
	Maou	64	0	56	-
	PhoneCall	64	0	65	-
	DoorSqueak	64	0	66	-
	DoorSlam	64	0	67	-
	ScratchCut	64	0	68	-
	ScratchSplit	64	0	69	-
	WindChime	64	0	70	-
	TelphonRing2	64	0	71	-
	CarEngineIgn	64	0	81	-
	CarTiresSqel	64	0	82	-
	CarPassing	64	0	83	-
	CarCrash	64	0	84	-
	Siren	64	0	85	-
	Train	64	0	86	-
	JetPlane	64	0	87	-
	Starship	64	0	88	-
	Burst	64	0	89	-
	RollrCoaster	64	0	90	-
	Submarine	64	0	91	-
	Laugh	64	0	97	-
	Scream	64	0	98	-
	Punch	64	0	99	-
	Heartbeat	64	0	100	-
	FootSteps	64	0	101	-
	MachineGun	64	0	113	-
	LaserGun	64	0	114	-
	Explosion	64	0	115	-
	Firework	64	0	116	-

GM 2

Category	Voice Name	Voice Number			Voice Type
		MSB	LSB	PRG	
Piano	GrandPiano	121	0	1	-
	GrandPianoW	121	1	1	-
	GrandPianoD	121	2	1	-
	BrightPiano	121	0	2	-
	BrightPianoW	121	1	2	-
	ElecGrandPno	121	0	3	-
	ElecGrandPW	121	1	3	-
	Honkytonk	121	0	4	-
	HonkytonkW	121	1	4	-
	El.Piano1	121	0	5	-
	DetunedEP1	121	1	5	-
	EP1VeloMix	121	2	5	-
	60'sEl.Piano	121	3	5	-
	El.Piano2	121	0	6	-
	DetunedEP2	121	1	6	-
	EP2VeloMix	121	2	6	-
	EPLegend	121	3	6	-
	EPPhase	121	4	6	-
	Harpsichord	121	0	7	-
	Harpsi.OctMx	121	1	7	-
	HarpsichordW	121	2	7	-
	Harpsi.KOff	121	3	7	-
	Clavi.	121	0	8	-
	PulseClavi.	121	1	8	-
ChromaticPerc	Celesta	121	0	9	-
	Glockenspiel	121	0	10	-
	MusicBox	121	0	11	-
	Vibraphone	121	0	12	-
	VibraphoneW	121	1	12	-
	Marimba	121	0	13	-
	MarimbaW	121	1	13	-
	Xylophone	121	0	14	-
	TubularBells	121	0	15	-
	ChurchBells	121	1	15	-
	Carillon	121	2	15	-
	Dulcimer	121	0	16	-
Organ	DrawbarOrgan	121	0	17	-
	DetDrawOrgan	121	1	17	-
	It60'sOrgan	121	2	17	-
	DrawbarOrg2	121	3	17	-
	Perc.Organ	121	0	18	-
	DetPercOrgan	121	1	18	-
	Perc.Organ2	121	2	18	-
	RockOrgan	121	0	19	-
	ChurchOrgan	121	0	20	-
	ChrchOrgOctM	121	1	20	-
	DetChurchOrg	121	2	20	-
	ReedOrgan	121	0	21	-
	PuffOrgan	121	1	21	-
	Accordion	121	0	22	-
	Accordion2	121	1	22	-
	Harmonica	121	0	23	-
	TangoAccord	121	0	24	-
Guitar	NylonGuitar	121	0	25	-
	Ukulele	121	1	25	-
	NylonGtrKOff	121	2	25	-
	NylonGuitar2	121	3	25	-
	SteelGuitar	121	0	26	-
	12StrGuitar	121	1	26	-
	Mandolin	121	2	26	-
	Steel&Body	121	3	26	-
	JazzGuitar	121	0	27	-
	PedlSteelGtr	121	1	27	-
	CleanGuitar	121	0	28	-
	DetCleanGtr	121	1	28	-
	MidToneGtr	121	2	28	-
	MutedGuitar	121	0	29	-
	FunkGuitar	121	1	29	-
	MutedV-SwGtr	121	2	29	-
	JazzMan	121	3	29	-
	Overdriven	121	0	30	-
	GuitarPinch	121	1	30	-
	Distortion	121	0	31	-
	FeedbackGtr	121	1	31	-
	DstRhythmGtr	121	2	31	-
	GtrHarmonics	121	0	32	-
	GtrFeedback	121	1	32	-
Bass	AcousticBass	121	0	33	-
	FingerBass	121	0	34	-
	FingerSlap	121	1	34	-
	PickBass	121	0	35	-
	FretlessBass	121	0	36	-
	SlapBass1	121	0	37	-
	SlapBass2	121	0	38	-
	SynthBass1	121	0	39	-
	WarmSyBass	121	1	39	-
	ResoSynhBass	121	2	39	-
Bass	ClaviBass	121	3	39	-
	Hammer	121	4	39	-
	SynthBass2	121	0	40	-
	AttackBass	121	1	40	-
	RubberBass	121	2	40	-
	AttackPulse	121	3	40	-
Strings	Violin	121	0	41	-
	SlwAtkViolin	121	1	41	-
	Viola	121	0	42	-
	Cello	121	0	43	-
	Contrabass	121	0	44	-
	Trem.Strings	121	0	45	-
	PizzicatoStr	121	0	46	-
	Orch.Harp	121	0	47	-
	YangChin	121	1	47	-
	Timpani	121	0	48	-
Ensemble	Strings1	121	0	49	-
	StringsBrass	121	1	49	-
	60'sStrings	121	2	49	-
	Strings2	121	0	50	-
	SynStrings1	121	0	51	-
	SynStrings3	121	1	51	-
	SynStrings2	121	0	52	-
	ChoirAahs	121	0	53	-
	ChoirAahs2	121	1	53	-
	VoiceOohs	121	0	54	-
	Humming	121	1	54	-
	SynthVoice	121	0	55	-
	AnalogVoice	121	1	55	-
	OrchestraHit	121	0	56	-
	BassHitPlus	121	1	56	-
	6thHit	121	2	56	-
	EuroHit	121	3	56	-
Brass	Trumpet	121	0	57	-
	DarkTpSoft	121	1	57	-
	Trombone	121	0	58	-
	Trombone2	121	1	58	-
	BriteTrombon	121	2	58	-
	Tuba	121	0	59	-
	MutedTrumpet	121	0	60	-
	MuteTrumpet2	121	1	60	-
	FrenchHorn	121	0	61	-
	FrenchHorn2	121	1	61	-
	BrassSection	121	0	62	-
	BrassSect2	121	1	62	-
	SynthBrass1	121	0	63	-
	SynthBrass3	121	1	63	-
	AnaSynBrass1	121	2	63	-
	JumpBrass	121	3	63	-
	SynthBrass2	121	0	64	-
	SynthBrass4	121	1	64	-
	AnaSynBrass2	121	2	64	-
Reed	SopranoSax	121	0	65	-
	AltoSax	121	0	66	-
	TenorSax	121	0	67	-
	BaritoneSax	121	0	68	-
	Oboe	121	0	69	-
	EnglishHorn	121	0	70	-
	Bassoon	121	0	71	-
	Clarinet	121	0	72	-
Pipe	Piccolo	121	0	73	-
	Flute	121	0	74	-
	Recorder	121	0	75	-
	PanFlute	121	0	76	-
	BlownBottle	121	0	77	-
	Shakuhachi	121	0	78	-
	Whistle	121	0	79	-
	Ocarina	121	0	80	-
Synth.Lead	SquareLead	121	0	81	-
	SquareLead2	121	1	81	-
	SineLead	121	2	81	-
	SawtoothLead	121	0	82	-
	SawtoothLd2	121	1	82	-
	SawPulseLead	121	2	82	-
	DoublSawLead	121	3	82	-
	Seq.Analog	121	4	82	-
	CalliopeLead	121	0	83	-
	ChiffLead	121	0	84	-
	CharangLead	121	0	85	-
	WireLead	121	1	85	-
	VoiceLead	121	0	86	-
	FifthsLead	121	0	87	-
	Bass&Lead	121	0	88	-
	SoftWhirl	121	1	88	-
Synth.Pad	NewAgePad	121	0	89	-
	WarmPad	121	0	90	-
	SinePad	121	1	90	-

Category	Voice Name	Voice Number			Voice Type
		MSB	LSB	PRG	
Synth.Pad	PolySynthPad	121	0	91	-
	ChoirPad	121	0	92	-
	ItopiaPad	121	1	92	-
	BowedPad	121	0	93	-
	MetallicPad	121	0	94	-
	HaloPad	121	0	95	-
	SweepPad	121	0	96	-
Synth.Effect	Rain	121	0	97	-
	SoundTrack	121	0	98	-
	Crystal	121	0	99	-
	SynthMallet	121	1	99	-
	Atmosphere	121	0	100	-
	Brightness	121	0	101	-
	Goblins	121	0	102	-
	Echoes	121	0	103	-
	EchoBell	121	1	103	-
	EchoPan	121	2	103	-
	Sci-Fi	121	0	104	-
Ethnic	Sitar	121	0	105	-
	Sitar2	121	1	105	-
	Banjo	121	0	106	-
	Shamisen	121	0	107	-
	Koto	121	0	108	-
	TaishoKoto	121	1	108	-
	Kalimba	121	0	109	-
	Bagpipe	121	0	110	-
	Fiddle	121	0	111	-
	Shanai	121	0	112	-
Percussive	TinkleBell	121	0	113	-
	Agogo	121	0	114	-
	SteelDrums	121	0	115	-
	Woodblock	121	0	116	-
	Castanets	121	1	116	-
	TaikoDrum	121	0	117	-
	ConcertBD	121	1	117	-
	MelodicTom	121	0	118	-
	MelodicTom2	121	1	118	-
	SynthDrum	121	0	119	-
	RhythmBoxTom	121	1	119	-
	ElectricDrum	121	2	119	-
	Rev.Cymbal	121	0	120	-
SoundEffect	GtrFretNoise	121	0	121	-
	GtrCutNoise	121	1	121	-
	StringSlap	121	2	121	-
	BreathNoise	121	0	122	-
	Fl.KeyClick	121	1	122	-
	Seashore	121	0	123	-
	Rain	121	1	123	-
	Thunder	121	2	123	-
	Wind	121	3	123	-
	Stream	121	4	123	-
	Bubble	121	5	123	-
	BirdTweet	121	0	124	-
	Dog	121	1	124	-
	HorseGallop	121	2	124	-
	BirdTweet2	121	3	124	-
	TelephonRing	121	0	125	-
	TelRing2	121	1	125	-
	DoorCreaking	121	2	125	-
	Door	121	3	125	-
	Scratch	121	4	125	-
	WindChime	121	5	125	-
	Helicopter	121	0	126	-
	CarEngine	121	1	126	-
	CarStop	121	2	126	-
	CarPass	121	3	126	-
	CarCrash	121	4	126	-
	Siren	121	5	126	-
	Train	121	6	126	-
	Jetplane	121	7	126	-
	Starship	121	8	126	-
	BurstNoise	121	9	126	-
	Applause	121	0	127	-
	Laughing	121	1	127	-
	Screaming	121	2	127	-
	Punch	121	3	127	-
	HeartBeat	121	4	127	-
	Footsteps	121	5	127	-
	Gunshot	121	0	128	-
	MachineGun	121	1	128	-
	Lasergun	121	2	128	-
	Explosion	121	3	128	-
Drum	StandardSet	120	0	1	Drums
	RoomSet	120	0	9	Drums
	PowerSet	120	0	17	Drums
	ElectroSet	120	0	25	Drums
	AnalogSet	120	0	26	Drums

Category	Voice Name	Voice Number			Voice Type
		MSB	LSB	PRG	
Drum	JazzSet	120	0	33	Drums
	BrushSet	120	0	41	Drums
	OrchestraSet	120	0	49	Drums
	SFXSet	120	0	57	SFX Kit

MSB (0-127)	8			8			8			8			
LSB (0-127)	0			0			0			1			
PRG (0-127)	0			1			2			2			
PRG (1-128)	1			2			3			3			
Voice Name	Mega NylonGuitar			Mega SteelGuitar			Mega HiStringGtr			Mega 12StringGtr			
Key Range	below B5	above C6	above C8	below B5	above C6	above C8	below B5	above C6	above C8	below B5		above C6	above C8
										Element1 (Steel)	Element2 (HiString)		
Key On Velocity Value 127, 120, 110, 100, 90, 80, 70, 60, 50, 40, 30, 20, 10, 1	127 Harmonics 121 120 Slide 106 105 Hammer 91 90 Mute 76 75 Dead 61 60 Open Hard 41 40 Open Medium 21 20 Open Soft 1	127 Strum Noise 1	127 Fret Noise 1	127 Harmonics 121 120 Slide 106 105 Hammer 91 90 Mute 76 75 Dead 61 60 Open Hard 41 40 Open Medium 21 20 Open Soft 1	127 Strum Noise 1	127 Fret Noise 1	127 Hard 90 89 Soft 1	127 Strum Noise 1	127 Fret Noise 1	127 Hard 116 115 Medium 72 71 Soft 1	127 Hard 90 89 Soft 1	127 Strum Noise 1	127 Fret Noise 1

: No Sound

MSB (0-127)	8			8			8			8			8		
LSB (0-127)	0			1			2			3			4		
PRG (0-127)	3			3			3			3			3		
PRG (1-128)	4			4			4			4			4		
Voice Name	Mega CleanGuitar			Mega SolidGuitar1			Mega SolidGuitar2			Mega SingleCoil			Mega FingerGtr		
Key Range	below B5	above C6	above C8	below B5	above C6	above C8	below B5	above C6	above C8	below B5	above C6	above C8	below B5	above C6	above C8
127	127 Pick Harmonics 121	127	127	127 Pick Harmonics 121	127	127	127 Pick Harmonics 121	127	127	127 Pick Harmonics 121	127	127	127 Pick Harmonics 121	127	127
120 110	120 Slide 106			120 Slide 106			120 Slide 106			120 Slide 106			120 Slide 106		
100	105 Hammer 91			105 Hammer 91			105 Hammer 91			105 Hammer 91			105 Hammer 91		
90 80	90 Mute 76			90 Mute 76			90 Mute 76			90 Mute 76			90 Mute 76		Fret Noise
70 Key On Velocity Value	75 Dead 61	Strum Noise	Fret Noise	75 Dead 61	Strum Noise	Fret Noise	75 Dead 61	Strum Noise	Fret Noise	75 Dead 61	Strum Noise	Fret Noise	75 Dead 61	Strum Noise	
60 50	60 Slap 41			60 Slap 41			60 Open Hard 41			60 Open Hard 41			60 Open Hard 41		
40 30	40 Open Hard 21			40 Open Hard 21			40 Open Medium 21			40 Open Medium 21			40 Open Medium 21		21
20 10 1	20 Open Soft 1	1	1	20 Open Soft 1	1	1	20 Open Soft 1	1	1	20 Open Soft 1	1	1	20 Open Soft 1	1	20 EFX 1

MSB (0-127)	8			8			8			8			8		
LSB (0-127)	5			6			7			8			0		
PRG (0-127)	3			3			3			3			4		
PRG (1-128)	4			4			4			4			5		
Voice Name	Mega FingerSlapGtr			Mega VintagePickGtr			Mega VintageSlapGtr			Mega SlapAmpGtr			Mega OverdriveGtr		
Key Range	below B5	above C6	above C8	below B5	above C6	above C8	below B5	above C6	above C8	below B5	above C6	above C8	below B5	above C6	above C8
Key On Velocity Value 127 120 110 100 90 80 70 60 50 40 30 20 10 1	127 Pick Harmonics 121 120 Slide 106 105 Hammer 91 90 Mute 76 75 Dead 61 60 Open Hard 41 40 Open Medium 21 20 Open Soft 1	127 Strum Noise 1	127 Fret Noise 21 20 EFX 1	127 Pick Harmonics 121 120 Slide 106 105 Hammer 91 90 Mute 76 75 Dead 61 60 Open Hard 41 40 Open Medium 21 20 Open Soft 1	127 Strum Noise 1	127 Fret Noise 21 20 EFX 1	127 Pick Harmonics 121 120 Slide 106 105 Hammer 91 90 Mute 76 75 Dead 61 60 Open Hard 41 40 Open Medium 21 20 Open Soft 1	127 Strum Noise 1	127 Fret Noise 21 20 EFX 1	127 Pick Harmonics 121 120 Slide 106 105 Hammer 91 90 Mute mf 83 82 Mute mp 76 75 Dead mf 68 67 Dead mp 61 60 Open Slap Line 51 50 Open Slap Amp 41 40 Open Hard 31 30 Open Medium 21 20 Open Soft 1	127 Strum Noise 1	127 Fret Noise 21 20 EFX 1	127 Pick Harmonics 121 120 Mute 56 55 Open 1	127 EFX 1	

MSB (0-127)	8			8			8			8		
LSB (0-127)	0			0			0			0		
PRG (0-127)	5			6			16			17		
PRG (1-128)	6			7			17			18		
Voice Name	Mega DistortionGtr			Mega JazzGuitar			Mega AcousticBass			Mega ElectricBass		
Key Range	below B5	above C6	above C8	below B5	above C6	above C8	below B5	above C6	above C8	below B5	above C6	above C8
Key On Velocity Value (127, 120, 110, 100, 90, 80, 70, 60, 50, 40, 30, 20, 10, 1)	127 Pick Harmonics 121 120 Mute 56 55 Open 1	127 EFX 1		127 Pick Harmonics 121 120 Slide 106 105 Hammer 91 90 Dead Hard 76 75 Dead Soft 61 60 Open Hard 41 40 Open Medium 21 20 Open Soft 1	127 Strum Noise 1	127 Fret Noise 1	127 Harmonics 121 120 Dead 81 80 Open Hard 61 60 Open Soft 1	127 EFX 1		127 Slap 121 120 Dead 81 80 Open Hard 61 60 Open Soft 1	127 EFX 1	

MSB (0-127)	8			8			8			8			8		
LSB (0-127)	1			2			0			1			0		
PRG (0-127)	17			17			18			18			19		
PRG (1-128)	18			18			19			19			20		
Voice Name	Mega VintageRound			Mega VintageFlat			Mega PickBass			Mega VintagePick			Mega FretlessBass		
Key Range	below B5	above C6	above C8	below B5	above C6	above C8	below B5	above C6	above C8	below B5	above C6	above C8	below B5	above C6	above C8
Key On Velocity Value (127–1)	127–121 Harmonics	127–1 EFX		127–121 Harmonics	127–1 EFX		127–121 Harmonics	127–1 EFX		127–121 Harmonics	127–1 EFX		127–121 Harmonics	127–1 EFX	
	120–81 Dead			120–81 Dead			120–81 Dead			120–81 Dead			120–81 Dead		
	80–61 Open Hard			80–61 Open Hard			80–41 Mute			80–41 Mute			80–1 Open		
	60–1 Open Soft			60–1 Open Soft			40–1 Open			40–1 Open					

MSB (0-127)	8			8			8			8			8		
LSB (0-127)	0			1			0			1			0		
PRG (0-127)	48			48			49			49			51		
PRG (1-128)	49			49			50			50			52		
Voice Name	Mega SmallStrings			Mega ClassicalStrings			Mega LargeStrings			Mega RealStrings			Mega MaleVoiceChoir		
Key Range	below B5	above C6	above C8	below B5	above C6	above C8	below B5	above C6	above C8	below B5	above C6	above C8	below B5	above C6	above C8
127	127 **Glissando Down** 121			127 **Glissando Down** 121			127 **Glissando Down** 121			127 **Glissando Down** 121			127 **Aah mf Legato** 106		
120	120 **Tremolo** 111			120 **Tremolo** 111			120 **Tremolo** 111			120 **Tremolo** 111			105 **Aah mf** 91		
110 100	110 **Spicato ff** 96			110 **Spicato ff** 96			110 **Spicato ff** 96			110 **Spicato ff** 96			90 **Aah p Legato** 76		
90	95 **Spicato f** 81			95 **Spicato f** 81			95 **Spicato f** 81			95 **Spicato f** 81			75 **Aah p** 61		
80 70 **Key On Velocity Value**	80 **Legato** 61			80 **Legato** 61			80 **Legato** 61			80 **Legato** 61			60 **Ooh mf Legato** 46		
60 50	60 **f** 41			60 **f** 41			60 **f** 41			60 **f** 41			45 **Ooh mf** 31		
40 30	40 **mf** 21			40 **mf** 21			40 **mf** 21			40 **mf** 21			30 **Ooh p Legato** 16		
20 10 1	20 **p** 1			20 **p** 1			20 **p** 1			20 **p** 1			15 **Ooh p** 1		

MSB (0-127)	8			8			8			8			
LSB (0-127)	0			0			0			0			
PRG (0-127)	54			56			64			82			
PRG (1-128)	55			57			65			83			
Voice Name	Mega GospelChoir			Mega Brass			Mega Trumpet			Mega TenorSax			
Key Range	below B5	above C6	above C8	below B5	above C6	above C8	below B5	above C6	above C8	below B5	C6–B6	C7–B7	above C8
127 120 110 100 90 80 70 **Key On Velocity Value** 60 50 40 30 20 10 1	127 **Aaa Legato** 106 105 **Aaa** 91 90 **Hey Legato** 76 75 **Hey** 61 60 **Wow Legato** 46 45 **Wow** 31 30 **Hmm Legato** 16 15 **Hmm** 1	127 **Ad Libs EFX** 1	127 **Ad Libs EFX** 1	127 **Glissando Up** 121 120 **Falls Fast f** 111 110 **Falls Fast mf** 101 100 **Shake** 91 90 **Scoops** 81 80 **Attack** 61 60 **f** 41 40 **mf** 21 20 **p** 1			127 **Glissando Up** 121 120 **Falls** 111 110 **Shake** 101 100 **Straight** 81 80 **Legato** 61 60 **ff** 41 40 **f** 21 20 **mf** 1	127 **Valve Noise** 1	127 **Breath Noise** 1	127 **Falls** 101 100 **Growl** 81 80 **Legato** 61 60 **f** 41 40 **mf** 21 20 **mp** 1	127 **Valve Noise (Key On Noise)** 1	127 **Valve Noise (Key Off Noise)**	127 **Breath Noise** 1

MSB (0-127)	8				8				8				8			
LSB (0-127)	0				0				0				0			
PRG (0-127)	100				101				102				105			
PRG (1-128)	101				102				103				106			
Voice Name	PopHaa				PopDaa				PopBaa				PopHoo			
Key Range	below B5	C6–D#6	E6–B7	above C8	below B5	C6–D#6	E6–B7	above C8	below B5	C6–D#6	E6–B7	above C8	below B5	C6–D#6	E6–B7	above C8
127 120	127 Waa Vib f 111	127 Breath Noise (Breath Out) 61	127 Breath Noise (Long 2) 91		127 Waa Vib f 111	127 Breath Noise (Breath Out) 61	127 Breath Noise (Long 2) 91		127 Yaa Vib f 111	127 Breath Noise (Breath Out) 61	127 Breath Noise (Long 2) 91		127 Yoo Vib f 111	127 Breath Noise (Breath Out) 61	127 Breath Noise (Long 2) 91	
110	110 Waa f 101				110 Waa f 101				110 Yaa f 101				110 Yoo f 101			
100	100 Waa Vib p 91				100 Waa Vib p 91				100 Yaa Vib p 91				100 Yoo Vib p 91			
90	90 Waa p 81		90 Breath Noise (Long 1) 61		90 Waa p 81		90 Breath Noise (Long 1) 61		90 Yaa p 81		90 Breath Noise (Long 1) 61		90 Yoo p 81		90 Breath Noise (Long 1) 61	
80	80 Aa Vib f Legato 71				80 Aa Vib f Legato 71				80 Aa Vib f Legato 71				80 Oo Vib f Legato 71			
70 Key On Velocity Value	70 Haa Vib f 61				70 Daa Vib f 61				70 Baa Vib f 61				70 Hoo Vib f 61			
60	60 Aa f Legato 51	60 Breath Noise (Breath In) 1	60 Breath Noise (Short 2) 31		60 Aa f Legato 51	60 Breath Noise (Breath In) 1	60 Breath Noise (Short 2) 31		60 Aa f Legato 51	60 Breath Noise (Breath In) 1	60 Breath Noise (Short 2) 31		60 Oo f Legato 51	60 Breath Noise (Breath In) 1	60 Breath Noise (Short 2) 31	
50	50 Haa f 41				50 Daa f 41				50 Baa f 41				50 Hoo f 41			
40	40 Aa Vib p Legato 31				40 Aa Vib p Legato 31				40 Aa Vib p Legato 31				40 Oo Vib p Legato 31			
30	30 Haa Vib p 21		30 Breath Noise (Short 1) 1		30 Daa Vib p 21		30 Breath Noise (Short 1) 1		30 Baa Vib p 21		30 Breath Noise (Short 1) 1		30 Hoo Vib p 21		30 Breath Noise (Short 1) 1	
20	20 Aa p Legato 11				20 Aa p Legato 11				20 Aa p Legato 11				20 Oo p Legato 11			
10 1	10 Haa p 1				10 Daa p 1				10 Baa p 1				10 Hoo p 1			

MSB (0-127)	8				8				8				8			
LSB (0-127)	0				0				0				0			
PRG (0-127)	106				103				110				107			
PRG (1-128)	107				104				111				108			
Voice Name	PopDoo				PopShoo				PopHee				PopBee			
Key Range	below B5	C6–D#6	E6–B7	above C8	below B5	C6–D#6	E6–B7	above C8	below B5	C6–D#6	E6–B7	above C8	below B5	C6–D#6	E6–B7	above C8
Key On Velocity Value: 127 / 120	127–111 Yoo Vib f	127–61 Breath Noise (Breath Out)	127–91 Breath Noise (Long 2)		127–111 Yoo Vib f	127–61 Breath Noise (Breath Out)	127–91 Breath Noise (Long 2)		127–111 Wee Vib p	127–61 Breath Noise (Breath Out)	127–91 Breath Noise (Long 2)		127–111 Wee Vib p	127–61 Breath Noise (Breath Out)	127–91 Breath Noise (Long 2)	
110	110–101 Yoo f				110–101 Yoo f				110–101 Wee Vib p				110–101 Wee Vib p			
100	100–91 Yoo Vib p				100–91 Yoo Vib p				100–91 Wee Vib p				100–91 Wee Vib p			
90	90–81 Yoo p		90–61 Breath Noise (Long 1)		90–81 Yoo p		90–61 Breath Noise (Long 1)		90–81 Wee Vib p		90–61 Breath Noise (Long 1)		90–81 Wee Vib p		90–61 Breath Noise (Long 1)	
80	80–71 Oo Vib f Legato				80–71 Oo Vib f Legato				80–71 Ee Vib p Legato				80–71 Ee Vib p Legato			
70	70–61 Doo Vib f				70–61 Shoo Vib f				70–61 Hee Vib p				70–61 Bee Vib p			
60	60–51 Oo f Legato	60–1 Breath Noise (Breath In)	60–31 Breath Noise (Short 2)		60–51 Oo f Legato	60–1 Breath Noise (Breath In)	60–31 Breath Noise (Short 2)		60–51 Ee Vib p Legato	60–1 Breath Noise (Breath In)	60–31 Breath Noise (Short 2)		60–51 Ee Vib p Legato	60–1 Breath Noise (Breath In)	60–31 Breath Noise (Short 2)	
50	50–41 Doo f				50–41 Shoo f				50–41 Hee Vib p				50–41 Bee Vib p			
40	40–31 Oo Vib p Legato				40–31 Oo Vib p Legato				40–31 Ee Vib p Legato				40–31 Ee Vib p Legato			
30	30–21 Doo Vib p		30–1 Breath Noise (Short 1)		30–21 Shoo Vib p		30–1 Breath Noise (Short 1)		30–21 Hee Vib p		30–1 Breath Noise (Short 1)		30–21 Bee Vib p		30–1 Breath Noise (Short 1)	
20	20–11 Oo p Legato				20–11 Oo p Legato				20–11 Ee Vib p Legato				20–11 Ee Vib p Legato			
10 / 1	10–1 Doo p				10–1 Shoo p				10–1 Hee Vib p				10–1 Bee Vib p			

MSB (0-127)	8				8				8			
LSB (0-127)	0				0				0			
PRG (0-127)	115				120				125			
PRG (1-128)	116				121				126			
Voice Name	PopHaa L2				PopHoo L2				PopHee L2			
Key Range	below B5	C6–D#6	E6–B7	above C8	below B5	C6–D#6	E6–B7	above C8	below B5	C6–D#6	E6–B7	above C8
Key On Velocity Value: 127–111	127–111 Waa Vib f	127–61 Breath Noise (Breath Out)	127–91 Breath Noise (Long 2)		127–111 Yoo Vib f	127–61 Breath Noise (Breath Out)	127–91 Breath Noise (Long 2)		127–111 Wee Vib p	127–61 Breath Noise (Breath Out)	127–91 Breath Noise (Long 2)	
110–101	110–101 Waa Vib p				110–101 Yoo Vib p				110–101 Wee Vib p			
100–91	100–91 Waa p				100–91 Yoo p				100–91 Wee Vib p			
90–81	90–81 Waa p		90–61 Breath Noise (Long 1)		90–81 Yoo p		90–61 Breath Noise (Long 1)		90–81 Wee Vib p		90–61 Breath Noise (Long 1)	
80–71	80–71 Aa Vib f Legato2				80–71 Oo Vib f Legato2				80–71 Ee Vib p Legato2			
70–61	70–61 Haa Vib f				70–61 Hoo Vib f				70–61 Hee Vib p			
60–51	60–51 Aa f Legato2	60–1 Breath Noise (Breath In)	60–31 Breath Noise (Short 2)		60–51 Oo f Legato2	60–1 Breath Noise (Breath In)	60–31 Breath Noise (Short 2)		60–51 Ee Vib p Legato2	60–1 Breath Noise (Breath In)	60–31 Breath Noise (Short 2)	
50–41	50–41 Haa f				50–41 Hoo f				50–41 Hee Vib p			
40–31	40–31 Aa Vib p Legato2				40–31 Oo Vib p Legato2				40–31 Ee Vib p Legato2			
30–21	30–21 Haa Vib p		30–1 Breath Noise (Short 1)		30–21 Hoo Vib p		30–1 Breath Noise (Short 1)		30–21 Hee Vib p		30–1 Breath Noise (Short 1)	
20–11	20–11 Aa p Legato2				20–11 Oo p Legato2				20–11 Ee Vib p Legato2			
10–1	10–1 Haa p				10–1 Hoo p				10–1 Hee Vib p			

Drum/key Assignment List / Liste der Tastenzuordnungen der Schlag-instrumente / Liste d'assignation instrument de batterie/touche du clavier

Panel Drum Kit/XG Drum Kit

Bank Select MSB (0-127)			127			127			127			127		
Bank Select LSB (0-127)			0			0			0			0		
Program Change (0-127)			0			1			4			8		
Program Change (1-128)			1			2			5			9		
Legacy			Legacy			Legacy								
MIDI		Keyboard Note	Live! StandardKit1	Key Off (*1)	Alternate Group (*2)	Live! StandardKit2	Key Off (*1)	Alternate Group (*2)	HitKit	Key Off (*1)	Alternate Group (*2)	RoomKit	Key Off (*1)	Alternate Group (*2)
Note#	Note													
13	C#-1	C#0	Surdo Mute		3									
14	D-1	D0	Surdo Open		3									
15	D#-1	D#0	Hi Q											
16	E-1	E0	Whip Slap											
17	F-1	F0	Scratch H		4									
18	F#-1	F#0	Scratch L		4									
19	G-1	G0	Finger Snap											
20	G#-1	G#0	Click Noise											
21	A-1	A0	Metronome Click											
22	A#-1	A#0	Metronome Bell											
23	B-1	B0	Seq Click L											
24	C0	C1	Seq Click H											
25	C#0	C#1	Brush Tap											
26	D0	D1	Brush Swirl	●										
27	D#0	D#1	Brush Slap											
28	E0	E1	Brush Tap Swirl	●										
29	F0	F1	Snare Roll	●										
30	F#0	F#1	Castanet											
31	G0	G1	Snare Soft			Snare Soft 2			Snare Electro					
32	G#0	G#1	Sticks											
33	A0	A1	Kick Soft						Kick Tight L					
34	A#0	A#1	Open Rim Shot			Open Rim Shot H Short			Snare Pitched					
35	B0	B1	Kick Tight						Kick Wet					
36	C1	C2	Kick			Kick Short			Kick Tight H					
37	C#1	C#2	Side Stick			Side Stick Light			Stick Ambient					
38	D1	D2	Snare			Snare Short			Snare Ambient			Snare Snappy		
39	D#1	D#2	Hand Clap											
40	E1	E2	Snare Tight			Snare Tight H			Snare Tight 2			Snare Tight Snappy		
41	F1	F2	Floor Tom L						Hybrid Tom 1			Tom Room 1		
42	F#1	F#2	Hi-Hat Closed		1				Hi-Hat Closed 2		1			
43	G1	G2	Floor Tom H						Hybrid Tom 2			Tom Room 2		
44	G#1	G#2	Hi-Hat Pedal		1				Hi-Hat Pedal 2		1			
45	A1	A2	Low Tom						Hybrid Tom 3			Tom Room 3		
46	A#1	A#2	Hi-Hat Open		1				Hi-Hat Open 2		1			
47	B1	B2	Mid Tom L						Hybrid Tom 4			Tom Room 4		
48	C2	C3	Mid Tom H						Hybrid Tom 5			Tom Room 5		
49	C#2	C#3	Crash Cymbal 1											
50	D2	D3	High Tom						Hybrid Tom 6			Tom Room 6		
51	D#2	D#3	Ride Cymbal 1											
52	E2	E3	Chinese Cymbal											
53	F2	F3	Ride Cymbal Cup											
54	F#2	F#3	Tambourine						Tambourine Light					
55	G2	G3	Splash Cymbal											
56	G#2	G#3	Cowbell											
57	A2	A3	Crash Cymbal 2											
58	A#2	A#3	Vibraslap											
59	B2	B3	Ride Cymbal 2											
60	C3	C4	Bongo H											
61	C#3	C#4	Bongo L											
62	D3	D4	Conga H Mute											
63	D#3	D#4	Conga H Open											
64	E3	E4	Conga L											
65	F3	F4	Timbale H											
66	F#3	F#4	Timbale L											
67	G3	G4	Agogo H											
68	G#3	G#4	Agogo L											
69	A3	A4	Cabasa											
70	A#3	A#4	Maracas											
71	B3	B4	Samba Whistle H	●										
72	C4	C5	Samba Whistle L	●										
73	C#4	C#5	Guiro Short											
74	D4	D5	Guiro Long	●										
75	D#4	D#5	Claves											
76	E4	E5	Wood Block H											
77	F4	F5	Wood Block L											
78	F#4	F#5	Cuica Mute											
79	G4	G5	Cuica Open											
80	G#4	G#5	Triangle Mute		2									
81	A4	A5	Triangle Open		2									
82	A#4	A#5	Shaker											
83	B4	B5	Jingle Bells											
84	C5	C6	Bell Tree											
85	C#5	(C#6)												
86	D5	(D6)												
87	D#5	(D#6)												
88	E5	(E6)												
89	F5	(F6)												
90	F#5	(F#6)												
91	G5	(G6)												

*1 Key Off: Keys marked "●" stop sounding the instant they are released.
*2 Alternate Group: Playing any instrument within a numbered group will immediately stop the sound of any other instrument in the same group of the same number.

Same as Live! StandardKit1 — No Sound

Bank Select MSB (0-127)			127			127			127			127		
Bank Select LSB (0-127)			0			0			0			0		
Program Change (0-127)			16			24			25			27		
Program Change (1-128)			17			25			26			28		
Legacy			Legacy											
MIDI Note#	MIDI Note	Keyboard Note	RockKit	Key Off (*1)	Alternate Group (*2)	ElectroKit	Key Off (*1)	Alternate Group (*2)	AnalogKit	Key Off (*1)	Alternate Group (*2)	DanceKit	Key Off (*1)	Alternate Group (*2)
13	C#-1	C#0										Kick Dance 1		
14	D-1	D0										Kick Dance 2		
15	D#-1	D#0										Hi Q		
16	E-1	E0										Whip Slap	●	
17	F-1	F0										Scratch Dance 1	●	
18	F#-1	F#0										Scratch Dance 2	●	
19	G-1	G0												
20	G#-1	G#0												
21	A-1	A0										Dance Perc 1		
22	A#-1	A#0										Reverse Dance 1		
23	B-1	B0										Dance Perc 2		
24	C0	C1										Hi Q Dance 1		
25	C#0	C#1										Snare Analog 3		
26	D0	D1										Vinyl Noise	●	
27	D#0	D#1										Snare Analog 4		
28	E0	E1				Reverse Cymbal	●		Reverse Cymbal	●		Reverse Cymbal	●	
29	F0	F1										Reverse Dance 2	●	
30	F#0	F#1				Hi Q 2			Hi Q 2			Hi Q 2		
31	G0	G1	Snare Noisy			Snare Snappy Electro			Snare Noisy 4			Snare Techno		
32	G#0	G#1										Snare Dance 1		
33	A0	A1				Kick 3			Kick 3			Kick Techno Q		
34	A#0	A#1										Rim Gate		
35	B0	B1	Kick 2			Kick Gate			Kick Analog Short			Kick Techno L		
36	C1	C2	Kick Gate			Kick Gate Heavy			Kick Analog			Kick Techno		
37	C#1	C#2							Side Stick Analog			Side Stick Analog		
38	D1	D2	Snare Rock			Snare Noisy 2			Snare Analog			Snare Clap		
39	D#1	D#2										Dance Clap		
40	E1	E2	Snare Rock Tight			Snare Noisy 3			Snare Analog 2			Snare Dry		
41	F1	F2	Tom Rock 1			Tom Electro 1			Tom Analog 1			Tom Analog 1		
42	F#1	F#2							Hi-Hat Closed Analog		1	Hi-Hat Closed 3		1
43	G1	G2	Tom Rock 2			Tom Electro 2			Tom Analog 2			Tom Analog 2		
44	G#1	G#2							Hi-Hat Closed Analog 2		1	Hi-Hat Closed Analog 3		1
45	A1	A2	Tom Rock 3			Tom Electro 3			Tom Analog 3			Tom Analog 3		
46	A#1	A#2							Hi-Hat Open Analog		1	Hi-Hat Open 3		1
47	B1	B2	Tom Rock 4			Tom Electro 4			Tom Analog 4			Tom Analog 4		
48	C2	C3	Tom Rock 5			Tom Electro 5			Tom Analog 5			Tom Analog 5		
49	C#2	C#3							Crash Analog			Crash Analog		
50	D2	D3	Tom Rock 6			Tom Electro 6			Tom Analog 6			Tom Analog 6		
51	D#2	D#3												
52	E2	E3												
53	F2	F3												
54	F#2	F#3										Tambourine Analog		
55	G2	G3												
56	G#2	G#3							Cowbell Analog			Cowbell Dance		
57	A2	A3												
58	A#2	A#3										Vibraslap Analog		
59	B2	B3										Ride Analog		
60	C3	C4										Bongo Analog H		
61	C#3	C#4										Bongo Analog L		
62	D3	D4							Conga Analog H			Conga Analog H		
63	D#3	D#4							Conga Analog M			Conga Analog M		
64	E3	E4							Conga Analog L			Conga Analog L		
65	F3	F4												
66	F#3	F#4												
67	G3	G4												
68	G#3	G#4												
69	A3	A4												
70	A#3	A#4							Maracas 2			Maracas 2		
71	B3	B4												
72	C4	C5												
73	C#4	C#5												
74	D4	D5												
75	D#4	D#5							Claves 2			Claves 2		
76	E4	E5										Dance Perc 3		
77	F4	F5										Dance Perc 4	●	
78	F#4	F#5				Scratch H 2			Scratch H 2			Dance Breath 1		
79	G4	G5				Scratch L 2			Scratch L 2			Dance Breath 2	●	
80	G#4	G#5												
81	A4	A5												
82	A#4	A#5												
83	B4	B5												
84	C5	C6												
85	C#5	(C#6)												
86	D5	(D6)												
87	D#5	(D#6)												
88	E5	(E6)												
89	F5	(F6)												
90	F#5	(F#6)												
91	G5	(G6)												

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*2 Alternate Group: Playing any instrument within a numbered group will immediately stop the sound of any other instrument in the same group of the same number.

Same as Live! StandardKit1 No Sound

Bank Select MSB (0-127)			127			127			127			127		
Bank Select LSB (0-127)			0			0			0			0		
Program Change (0-127)			32			40			41			48		
Program Change (1-128)			33			41			42			49		
Legacy						Legacy								
MIDI		Keyboard Note	JazzKit	Key Off (*1)	Alternate Group (*2)	Live! BrushKit	Key Off (*1)	Alternate Group (*2)	Live! RealBrushes	Key Off (*1)	Alternate Group (*2)	Live! SymphonyKit	Key Off (*1)	Alternate Group (*2)
Note#	Note													
13	C#-1	C#0												
14	D-1	D0												
15	D#-1	D#0												
16	E-1	E0												
17	F-1	F0												
18	F#-1	F#0												
19	G-1	G0												
20	G#-1	G#0												
21	A-1	A0												
22	A#-1	A#0												
23	B-1	B0							Vintage Tip					
24	C0	C1							Vintage Swirl 1	●				
25	C#0	C#1							Vintage Slap 1					
26	D0	D1							Vintage Swirl 2	●				
27	D#0	D#1							Vintage Slap 2					
28	E0	E1							Vintage Tap Swirl	●				
29	F0	F1							Vintage Slap Swirl	●				
30	F#0	F#1							Vintage Swirl 3	●				
31	G0	G1	Snare Jazz H			Brush Slap 2			Vintage Slap 3					
32	G#0	G#1												
33	A0	A1							Kick Soft L			Kick Soft 2		
34	A#0	A#1				Open Rim Shot Light			Open Rim Shot Real Brushes					
35	B0	B1							Kick Soft H			Gran Cassa		
36	C1	C2	Kick Jazz			Kick Jazz			Kick Jazz Ambience			Gran Cassa Mute		
37	C#1	C#2	Side Stick Light			Side Stick Light			Stick Brushe					
38	D1	D2	Snare Jazz L			Brush Slap 3			Vintage Slap 4			Band Snare		
39	D#1	D#2							Clap Power					
40	E1	E2	Snare Jazz M			Brush Tap 2			Vintage Slap 5			Band Snare 2		
41	F1	F2				Tom Brush 1			Tom Real Brushes 1					
42	F#1	F#2							Hi-Hat Closed Real Brushes		1			
43	G1	G2				Tom Brush 2			Tom Real Brushes 2					
44	G#1	G#2							Hi-Hat Pedal Real Brushes		1			
45	A1	A2				Tom Brush 3			Tom Real Brushes 3					
46	A#1	A#2							Hi-Hat Open Real Brushes		1			
47	B1	B2				Tom Brush 4			Tom Real Brushes 4					
48	C2	C3				Tom Brush 5			Tom Real Brushes 5					
49	C#2	C#3							Crash Cymbal Real Brushes			Hand Cymbal		
50	D2	D3				Tom Brush 6			Tom Real Brushes 6					
51	D#2	D#3							Ride Cymbal Real Brushes			Hand Cymbal Short		
52	E2	E3							CHINE CYM Real Brushes					
53	F2	F3							Ride Cup Real Brushes					
54	F#2	F#3												
55	G2	G3							Splash Cymbal Real Brushes					
56	G#2	G#3												
57	A2	A3							Crash Cymbal Real Brushes			Hand Cymbal 2		
58	A#2	A#3												
59	B2	B3							Ride Cup Real Brushes			Hand Cymbal Short 2		
60	C3	C4												
61	C#3	C#4												
62	D3	D4												
63	D#3	D#4												
64	E3	E4												
65	F3	F4												
66	F#3	F#4												
67	G3	G4												
68	G#3	G#4												
69	A3	A4												
70	A#3	A#4												
71	B3	B4												
72	C4	C5												
73	C#4	C#5												
74	D4	D5												
75	D#4	D#5												
76	E4	E5												
77	F4	F5												
78	F#4	F#5												
79	G4	G5												
80	G#4	G#5												
81	A4	A5												
82	A#4	A#5												
83	B4	B5												
84	C5	C6												
85	C#5	(C#6)												
86	D5	(D6)												
87	D#5	(D#6)												
88	E5	(E6)												
89	F5	(F6)												
90	F#5	(F#6)												
91	G5	(G6)												

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*2 Alternate Group: Playing any instrument within a numbered group will immediately stop the sound of any other instrument in the same group of the same number.

Same as Live! StandardKit1 — No Sound

Bank Select MSB (0-127)			127			127			127		
Bank Select LSB (0-127)			0			0			0		
Program Change (0-127)			56			57			58		
Program Change (1-128)			57			58			59		
Legacy											
MIDI		Keyboard Note	HipHopKit	Key Off (*1)	Alternate Group (*2)	BreakKit	Key Off (*1)	Alternate Group (*2)	AnalogT8Kit	Key Off (*1)	Alternate Group (*2)
Note#	Note										
13	C#-1	C#0			5						
14	D-1	D0			5						
15	D#-1	D#0									
16	E-1	E0									
17	F-1	F0			6						
18	F#-1	F#0			6						
19	G-1	G0	Hi-Hat Closed T8 2		4				Snare Hammer		
20	G#-1	G#0	Tom T8 3			Snare Break 8			Kick ZapHard		
21	A-1	A0	Hi-Hat Open T8 2		4	Snare Break 9			Snare Garg L		
22	A#-1	A#0	Tom T8 6			Hi-Hat Closed Break 1	●		Kick TekPower		
23	B-1	B0	Crash T8			Hi-Hat Closed Break 2	●		Kick Slimy		
24	C0	C1	Triangle Mute		1	Kick Break Deep			Kick T8 1		
25	C#0	C#1	Triangle Open		1	Snare Hip			Snare Analog CR		
26	D0	D1	Bell Tree			Snare Lo-Fi			Snare T8 4		
27	D#0	D#1	Tambourine RX5			Snare Clappy			Snare Clap Analog		
28	E0	E1	Tambourine RX5 2			Snare LdwH Mono			Snare T8 3		
29	F0	F1	Kick HipHop 9			Snare Rock Roll	●		Tom T8 5		
30	F#0	F#1	Hi-Hat Closed Tek		3	Snare Gate 1			Snare T8 5		
31	G0	G1	Kick Gate			Snare Mid			Kick T8 3		
32	G#0	G#1	Hi-Hat Open Lo-Fi		3	Snare Break Rim			Snare T8 4		
33	A0	A1	Kick Gran Casa Open			Kick Break Heavy			Kick T8 2		
34	A#0	A#1	Hi-Hat Reverse Drum&Bass			Snare Hip Rim 4			Snare T8 3		
35	B0	B1	Kick HipHop 1			Kick Break 2			T8 Kick Bass		
36	C1	C2	Kick Analog CR			Kick Break 1			Kick T8 1		
37	C#1	C#2	Snare Analog Sm Rim			Snare Hip Rim 1			Snare T8 Rim		
38	D1	D2	Snare HipHop 1			Snare Break 3			Snare T8 2		
39	D#1	D#2	Snare Clappy			Snare Break 1			Clap T9		
40	E1	E2	Snare HipHop 2			Snare Break 2			Snare T8 1		
41	F1	F2	Floor Tom L			Tom Break 1			Tom T8 1		
42	F#1	F#2	Hi-Hat Closed Hip		2	Hi-Hat Closed Rock Soft		1	Hi-Hat Closed T8		1
43	G1	G2	Low Tom			Tom Break 22			Tom T8 2		
44	G#1	G#2	Hi-Hat Pedal Hip		2	Hi-Hat Pedal Rock		1	Hi-Hat Pedal T8		1
45	A1	A2	Mid Tom L			Tom Break 3			Tom T8 3		
46	A#1	A#2	Hi-Hat Open Hip		2	Hi-Hat Half Open Rock		1	Hi-Hat Open T8		1
47	B1	B2	High Tom			Tom Break 4			Tom T8 4		
48	C2	C3	Ride Cymbal 3			Tom Break 5			Tom T8 6		
49	C#2	C#3	Crash Cymbal 3			Crash Cymbal 2			Crash T8		
50	D2	D3	Shaker 2			Tom Break 6			Tom T8 7		
51	D#2	D#3	Scratch Bass Drum Forward			Ride Cymbal 3			Ride T9		
52	E2	E3	Scratch Bass Drum Reverse			Chinese Cymbal 2			Chinese Cymbal 2		
53	F2	F3	Kick HipHop 2			Ride Cymbal Cup 2			Ride Cymbal Cup 2		
54	F#2	F#3	Snare HipHop Rim 2			Tambourine 1 Hit			Tambourine RX5		
55	G2	G3	HipHop Clap 2			Crash Cymbal 3			Splash Cymbal		
56	G#2	G#3	HipHop Snap 1			Cowbell 1			Cowbell T8		
57	A2	A3	Snare HipHop 3			Crash Cymbal 2			Crash Cymbal 4		
58	A#2	A#3	Electric Clap 2			Cowbell RX11			Vibraslap		
59	B2	B3	Kick Hip Deep			Ride Cymbal 2			Ride Cymbal 3		
60	C3	C4	Kick HipHop 3			Bongo H			Conga T8 5		
61	C#3	C#4	Snare HipHop Rim 3			Bongo L			Conga T8 4		
62	D3	D4	Snare HipHop 5			Conga H Tip			Conga T8 3		
63	D#3	D#4	Electric Clap 1			Conga H Open Slap			Conga T8 2		
64	E3	E4	Handbell H			Conga H Open			Conga T8 1		
65	F3	F4	Kick HipHop 4			Bongo 2 H			Timbale H		
66	F#3	F#4	HipHop Clap 3			Bongo 2 L			Timbale L		
67	G3	G4	HipHop Snap 2			Conga Open			Glass H		
68	G#3	G#4	Snare HipHop Rim 5			Agogo L			Glass L		
69	A3	A4	HipHop flex 1			Cabasa			Cabasa		
70	A#3	A#4	HipHop flex 2			Maracas Slur			Maracas T8		
71	B3	B4	Shaker 2			Timbale H			FxGun 2	●	
72	C4	C5	Kick HipHop 5			Timbale L			FxGun 1	●	
73	C#4	C#5	Snare HipHop Rim 4			Scratch H 2	●		Analog Shaker H	●	
74	D4	D5	Snare HipHop 6			Scratch Down	●		Analog Shaker L	●	
75	D#4	D#5	Snare HipHop 11			Clave			Clave T8		
76	E4	E5	Kick HipHop 10			Wood Block H			Hi Q 1		
77	F4	F5	Snare HipHop 7			Wood Block L			Hi Q 2		
78	F#4	F#5	HipHop Clap 5			Scratch L			Scratch L		
79	G4	G5	Conga H Tip			Scratch L 2			Scratch L 2		
80	G#4	G#5	Conga H Heel			Triangle Mute		2	Triangle Mute		2
81	A4	A5	Conga H Open			Triangle Open		2	Triangle Open		2
82	A#4	A#5	Conga L Open 1			Kick Break 3			Analog Shaker		
83	B4	B5	Conga L Open 2			Kick Break 4			Sleigh Bell		
84	C5	C6	Kick HipHop 8			Kick Break 5	●		Bell Tree		
85	C#5	(C#6)	HipHop Clap 6			Kick Break 6			Snare Hip 1		
86	D5	(D6)	Snare T8 1			Kick Break 7			Snare Hip 2		
87	D#5	(D#6)	Snare T8 1 H			Hi-Hat Closed Break 3			Snare Hip Gate		
88	E5	(E6)	HipHop Clap 7			Snare Break 4			Snare Break 1		
89	F5	(F6)	Tom T8 1			Snare Break 5			Kick Blip		
90	F#5	(F#6)	Hi-Hat Closed T8 2			Snare Break 6			Snare FX 1		
91	G5	(G6)	Tom T8 2			Snare Break 7			Kick FxHammer		

*1 Key Off: Keys marked "●" stop sounding the instant they are released.
*2 Alternate Group: Playing any instrument within a numbered group will immediately stop the sound of any other instrument in the same group of the same number.

Same as Live! StandardKit1   No Sound

Bank Select MSB (0-127)			127			127			127			127		
Bank Select LSB (0-127)			0			0			0			0		
Program Change (0-127)			59			60			61			86		
Program Change (1-128)			60			61			62			87		
Legacy														
MIDI		Keyboard Note	AnalogT9Kit	Key Off (*1)	Alternate Group (*2)	HouseKit	Key Off (*1)	Alternate Group (*2)	DrumMachine	Key Off (*1)	Alternate Group (*2)	Live! StudioKit	Key Off (*1)	Alternate Group (*2)
Note#	Note													
13	C#-1	C#0				W Kick	●							
14	D-1	D0				Disco Fx	●							
15	D#-1	D#0				White Noise Down 1	●							
16	E-1	E0				Pink Noise Down 1	●							
17	F-1	F0				White Noise Down 2	●	4						
18	F#-1	F#0				Pink Noise Down 2	●	4						
19	G-1	G0	Snare Drum&Bass 1			White Noise Up 2	●		Snare Drum&Bass 1					
20	G#-1	G#0	Kick Break 2			White Noise Up 1	●		Kick Break 2					
21	A-1	A0	Snare Distortion			Pink Noise Up	●		Snare Distortion					
22	A#-1	A#0	Kick TekPower			White Noise Up Release	●		Kick TekPower					
23	B-1	B0	Kick Distortion RM			Pink Noise Up Release	●		Kick Distortion RM					
24	C0	C1	Kick T9 2			Kick T9 4			Bass Drum Hard Long					
25	C#0	C#1	Snare Analog CR			Snare T8 Rim			Bass Drum TekPower					
26	D0	D1	Snare T9 5			Snare T8 5			Bass Drum Distortion 5					
27	D#0	D#1	Clap Analog Sm			Hand Clap			Bass Drum Distortion 3					
28	E0	E1	Snare T9 Gate			Snare Garg L			Bass Drum Distortion 1	●				
29	F0	F1	Snare Rock Roll	●		Snare Roll	●		Bass Drum Drum&Bass 1					
30	F#0	F#1	Snare T9 3			Snare T9 3			Bass Drum Blip					
31	G0	G1	Snare T9 4			Snare T8 1			Bass Drum Analog Sm			Snare Studio L		
32	G#0	G#1	Snare T9 Gate			Snare T9 5			Kick T8 2					
33	A0	A1	Kick T9 4			Kick T9 1			Kick T8 3			Kick Amb H		
34	A#0	A#1	Snare T9 5			Snare T9 Gate			Kick T9 HD 3			Open Rim Shot		
35	B0	B1	Kick T9 1			Kick T9 2			Kick T9 2			Kick Amb L		
36	C1	C2	Kick T9 3			Kick T9 5			Kick T9 4			Kick Studio		
37	C#1	C#2	Snare T9 Rim			Snare T9 Rim			Snare T9 Rim			Side Stick		
38	D1	D2	Snare T9 1			Snare T9 1			Snare T9 1			Snare Studio M		
39	D#1	D#2	Clap T9			Clap T9			Clap T9			Hand Clap		
40	E1	E2	Snare T9 2			Snare T9 2			Snare T9 4			Snare Studio L		
41	F1	F2	Tom T9 1			Tom T9 1			Tom T9 1					
42	F#1	F#2	Hi-Hat Closed T9		1	Hi-Hat Closed T8		1	Hi-Hat Closed T9		1			
43	G1	G2	Tom T9 2			Tom T9 2			Tom T9 2					
44	G#1	G#2	Hi-Hat Pedal T9		1	Hi-Hat Pedal T9		1	Hi-Hat Pedal T9		1			
45	A1	A2	Tom T9 3			Tom T9 3			Tom T9 3					
46	A#1	A#2	Hi-Hat Open T9		1	Hi-Hat Open T9		1	Hi-Hat Open T9		1			
47	B1	B2	Tom T9 4			Tom T9 4			Tom T9 4					
48	C2	C3	Tom T9 5			Tom T9 5			Tom T9 5					
49	C#2	C#3	Crash T9			Crash T9			Crash T9					
50	D2	D3	Tom T9 6			Tom T9 6			Conga T8 1					
51	D#2	D#3	Ride T9			Ride T9			Ride T9					
52	E2	E3	Chinese Cymbal 2			Crash Cymbal 4			Conga T8 2					
53	F2	F3	Ride Cymbal Cup 2			Ride Cymbal Cup 2			Analog Click					
54	F#2	F#3	Tambourine RX5			Tambourine Hit			Clave T8 1					
55	G2	G3	Crash Cymbal 3			Crash Cymbal 3			Maracas T8					
56	G#2	G#3	Cowbell 1			Cowbell 1			Tambourine Analog CR					
57	A2	A3	Crash Cymbal 4			Crash Cymbal 2			Analog Shaker					
58	A#2	A#3	Cowbell T8			Cowbell T8			Cowbell T8					
59	B2	B3	Ride Cymbal 3			Ride Cymbal 3			Cowbell Analog CR					
60	C3	C4	Conga T8 5			Bongo H Open 1 finger			Snare T8 1					
61	C#3	C#4	Conga T8 4			Bongo L Open 3 finger			Snare T8 2					
62	D3	D4	Conga Tip			Conga High Tip			Snare T8 3					
63	D#3	D#4	Conga Open Slap			Conga High Slap Open			Snare Analog CR					
64	E3	E4	Conga Open			Conga High Open 2			Snare Jungle 1					
65	F3	F4	Timbale H			Timbale H			Snare D&B 1					
66	F#3	F#4	Timbale L			Timbale L			Snare Hip 1					
67	G3	G4	Analog Click			Agogo H			Snare R&B 1					
68	G#3	G#4	Conga T8 1			Agogo L			Snare R&B 2					
69	A3	A4	Cabasa			Cabasa 1			Snare Hip 1					
70	A#3	A#4	Maracas Slur			Maracas Slur			Snare Wood					
71	B3	B4	FxGun 2	●		Vox Drum L			Snare Timbre					
72	C4	C5	FxGun 1	●		Vox Drum H			Hi-Hat Closed T8 1		5			
73	C#4	C#5	Scratch H 2	●		Guiro Short			Hi-Hat Open T8 1		5			
74	D4	D5	Scratch Down	●		Guiro Long	●		Hi-Hat Closed T8 2		6			
75	D#4	D#5	Hi Q 3			Claves			Hi-Hat Open T8 2		6			
76	E4	E5	Hi Q 1			Wood Block H			Hi-Hat Pedal Acoustic		7			
77	F4	F5	Hi Q 2			Wood Block L			Hi-Hat Closed Acoustic		7			
78	F#4	F#5	Scratch L			Cuica H			Hi-Hat Open Acoustic		7			
79	G4	G5	Scratch L 2			Cuica L			Hi-Hat Closed Lo-Fi		2			
80	G#4	G#5	Triangle Mute		2	Triangle Mute		2	Hi-Hat Open Lo-Fi		2			
81	A4	A5	Triangle Open		2	Triangle Open		2	Hi-Hat Closed Syn		8			
82	A#4	A#5	Analog Shaker			Analog Shaker			Hi-Hat Open Syn		8			
83	B4	B5	Sleigh Bell			Sleigh Bell			Analog Shaker					
84	C5	C6	Bell Tree			Wind Chime			Tambourine RX5					
85	C#5	(C#6)	Snare Piccolo			Snare Break Roll			Tambourine RX5					
86	D5	(D6)	Snare T8 5			Noise Burst			Electric Cow					
87	D#5	(D#6)	Snare Rock Roll Distortion			Vox Bell			Conga T8 3					
88	E5	(E6)	Snare Brush Mute			Snare R&B 1			Electric Triangle					
89	F5	(F6)	Kick Blip Hard			Vox Alk			Clave T8 2					
90	F#5	(F#6)	Snare Jungle 1			Udu High			Analog Shaker					
91	G5	(G6)	Kick Sustain			Filter Kick			Electric Clap 1					

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*2 Alternate Group: Playing any instrument within a numbered group will immediately stop the sound of any other instrument in the same group of the same number.

Same as Live! StandardKit1   No Sound

Bank Select MSB (0-127)			127			127			127		
Bank Select LSB (0-127)			0			0			0		
Program Change (0-127)			87			88			89		
Program Change (1-128)			88			89			90		
Legacy											
MIDI		Keyboard Note	Live! PowerKit1	Key Off (*1)	Alternate Group (*2)	Live! PowerKit2	Key Off (*1)	Alternate Group (*2)	Live! AcousticKit	Key Off (*1)	Alternate Group (*2)
Note#	Note										
13	C#-1	C#0									
14	D-1	D0									
15	D#-1	D#0									
16	E-1	E0									
17	F-1	F0									
18	F#-1	F#0									
19	G-1	G0									
20	G#-1	G#0									
21	A-1	A0									
22	A#-1	A#0									
23	B-1	B0									
24	C0	C1									
25	C#0	C#1									
26	D0	D1									
27	D#0	D#1									
28	E0	E1									
29	F0	F1							Snare Roll Acoustic	●	
30	F#0	F#1									
31	G0	G1	Snare Soft Power 1			Snare Soft Power 2			Snare Soft Acoustic		
32	G#0	G#1									
33	A0	A1	Kick Amb+			Kick Amb+			Kick Soft Acoustic		
34	A#0	A#1	Open Rim Power 1			Open Rim Power 2			Rim Acoustic		
35	B0	B1	Kick Power Open			Kick Power Open			Kick Close Acoustic		
36	C1	C2	Kick Power Closed			Kick Power Closed			Kick Open Acoustic		
37	C#1	C#2	Side Stick Power			Side Stick Power			Stick Acoustic		
38	D1	D2	Snare Power			Snare Power Snappy			Snare Acoustic		
39	D#1	D#2	Hand Clap Power			Hand Clap Power			Hand Clap Power		
40	E1	E2	Snare Rough			Snare Loose			Snare Rough Acoustic		
41	F1	F2	Tom Power 1			Tom Power 1			Tom Acoustic 1		
42	F#1	F#2	Hi-Hat Closed Power		1	Hi-Hat Closed Power+Edge		1	Hi-Hat Closed Acoustic		1
43	G1	G2	Tom Power 2			Tom Power 2			Tom Acoustic 2		
44	G#1	G#2	Hi-Hat Pedal Power		1	Hi-Hat Pedal Power		1	Hi-Hat Pedal Acoustic		1
45	A1	A2	Tom Power 3			Tom Power 3			Tom Acoustic 3		
46	A#1	A#2	Hi-Hat Open Power		1	Hi-Hat Open Power		1	Hi-Hat Open Acoustic		1
47	B1	B2	Tom Power 4			Tom Power 4			Tom Acoustic 4		
48	C2	C3	Tom Power 5			Tom Power 5			Tom Acoustic 5		
49	C#2	C#3	Crash Cymbal Acoustic 1			Crash Cymbal Acoustic 1			Crash Cymbal Acoustic 1		
50	D2	D3	Tom Power 6			Tom Power 6			Tom Acoustic 6		
51	D#2	D#3	Ride Cymbal Acoustic 1			Ride Cymbal Acoustic 1			Ride Cymbal Acoustic 1		
52	E2	E3	Chinese Cymbal Acoustic			Chinese Cymbal Acoustic			Chinese Cymbal Acoustic		
53	F2	F3	Ride Cymbal Acoustic			Ride Cymbal Acoustic			Ride Cymbal Acoustic		
54	F#2	F#3									
55	G2	G3	Splash Cymbal Acoustic			Splash Cymbal Acoustic			Splash Cymbal Acoustic		
56	G#2	G#3									
57	A2	A3	Crash Cymbal Acoustic 2			Crash Cymbal Acoustic 2			Crash Cymbal Acoustic 2		
58	A#2	A#3									
59	B2	B3	Ride Cymbal Acoustic 2			Ride Cymbal Acoustic 2			Ride Cymbal Acoustic 2		
60	C3	C4									
61	C#3	C#4									
62	D3	D4									
63	D#3	D#4									
64	E3	E4									
65	F3	F4									
66	F#3	F#4									
67	G3	G4									
68	G#3	G#4									
69	A3	A4									
70	A#3	A#4									
71	B3	B4									
72	C4	C5									
73	C#4	C#5									
74	D4	D5									
75	D#4	D#5									
76	E4	E5									
77	F4	F5									
78	F#4	F#5									
79	G4	G5									
80	G#4	G#5									
81	A4	A5									
82	A#4	A#5									
83	B4	B5									
84	C5	C6									
85	C#5	(C#6)									
86	D5	(D6)									
87	D#5	(D#6)									
88	E5	(E6)									
89	F5	(F6)									
90	F#5	(F#6)									
91	G5	(G6)									

*1 Key Off: Keys marked "●" stop sounding the instant they are released.
*2 Alternate Group: Playing any instrument within a numbered group will immediately stop the sound of any other instrument in the same group of the same number.

Same as Live! StandardKit1   No Sound

Bank Select MSB (0-127)			127			127			126		
Bank Select LSB (0-127)			0			0			0		
Program Change (0-127)			90			91			0		
Program Change (1-128)			91			92			1		
Legacy									Legacy		
MIDI		Keyboard Note	Live! RockKit	Key Off (*1)	Alternate Group (*2)	Live! RealDrums	Key Off (*1)	Alternate Group (*2)	SFXKit1	Key Off (*1)	Alternate Group (*2)
Note#	Note										
13	C#-1	C#0									
14	D-1	D0									
15	D#-1	D#0									
16	E-1	E0									
17	F-1	F0									
18	F#-1	F#0									
19	G-1	G0									
20	G#-1	G#0									
21	A-1	A0									
22	A#-1	A#0									
23	B-1	B0									
24	C0	C1									
25	C#0	C#1									
26	D0	D1				Brush Swirl 2	●				
27	D#0	D#1									
28	E0	E1									
29	F0	F1	Snare Roll Rock	●		Snare Roll Rock	●				
30	F#0	F#1									
31	G0	G1	Snare Soft Rock			SnareTight					
32	G#0	G#1									
33	A0	A1	Kick Soft Rock			Kick Genuine					
34	A#0	A#1	Rim Rock			Rim Real					
35	B0	B1	Kick Rock Heavy			Kick Real 1					
36	C1	C2	Kick Rock			Kick Real 2			Cutting Noise	●	
37	C#1	C#2	Stick Rock			Stick Real			Cutting Noise 2	●	
38	D1	D2	Snare Rock			Snare Real 1					
39	D#1	D#2	Hand Clap Power			Clap Power			String Slap	●	
40	E1	E2	Snare Dry Rock			Snare Real 2					
41	F1	F2	Tom Rock 1			Tom Real 1					
42	F#1	F#2	Hi-Hat Closed Rock		1	Hi-Hat Closed Real		1			
43	G1	G2	Tom Rock 2			Tom Real 2					
44	G#1	G#2	Hi-Hat Pedal Rock		1	Hi-Hat Pedal Real		1			
45	A1	A2	Tom Rock 3			Tom Real 3					
46	A#1	A#2	Hi-Hat Open Rock		1	Hi-Hat Open Real		1			
47	B1	B2	Tom Rock 4			Tom Real 4					
48	C2	C3	Tom Rock 5			Tom Real 5					
49	C#2	C#3	Crash Cymbal Acoustic 1			Crash Cymbal Real 1					
50	D2	D3	Tom Rock 6			Tom Real 6					
51	D#2	D#3	Ride Cymbal Acoustic 1			Ride Cymbal Real 1					
52	E2	E3	Chinese Cymbal Acoustic			CHINE CYM Real			Flute Key Click	●	
53	F2	F3	Ride Cymbal Acoustic			Ride Cup Real					
54	F#2	F#3									
55	G2	G3	Splash Cymbal Acoustic			Splash Cymbal Real					
56	G#2	G#3									
57	A2	A3	Crash Cymbal Acoustic 2			Crash Cymbal Real 2					
58	A#2	A#3									
59	B2	B3	Ride Cymbal Acoustic 2			Ride Cymbal Real 2					
60	C3	C4									
61	C#3	C#4									
62	D3	D4									
63	D#3	D#4									
64	E3	E4									
65	F3	F4									
66	F#3	F#4									
67	G3	G4									
68	G#3	G#4							Shower	●	
69	A3	A4							Thunder	●	
70	A#3	A#4							Wind	●	
71	B3	B4							Stream	●	
72	C4	C5							Bubble	●	
73	C#4	C#5							Feed	●	
74	D4	D5									
75	D#4	D#5									
76	E4	E5									
77	F4	F5									
78	F#4	F#5									
79	G4	G5									
80	G#4	G#5									
81	A4	A5									
82	A#4	A#5									
83	B4	B5									
84	C5	C6							Dog	●	
85	C#5	(C#6)							Horse	●	
86	D5	(D6)							Bird Tweet 2	●	
87	D#5	(D#6)									
88	E5	(E6)									
89	F5	(F6)									
90	F#5	(F#6)							Ghost	●	
91	G5	(G6)							Maou	●	

*1 Key Off: Keys marked "●" stop sounding the instant they are released.
*2 Alternate Group: Playing any instrument within a numbered group will immediately stop the sound of any other instrument in the same group of the same number.

Same as Live! StandardKit1 — No Sound

Bank Select MSB (0-127)			126			126			126			126		
Bank Select LSB (0-127)			0			0			0			0		
Program Change (0-127)			1			2			3			8		
Program Change (1-128)			2			3			4			9		
Legacy			Legacy											
MIDI		Keyboard Note	SFXKit2	Key Off (*1)	Alternate Group (*2)	Live! NewSFXKit1	Key Off (*1)	Alternate Group (*2)	Live! NewSFXKit2	Key Off (*1)	Alternate Group (*2)	NoisesKit	Key Off (*1)	Alternate Group (*2)
Note#	Note													
13	C#-1	C#0												
14	D-1	D0												
15	D#-1	D#0												
16	E-1	E0												
17	F-1	F0												
18	F#-1	F#0												
19	G-1	G0												
20	G#-1	G#0												
21	A-1	A0												
22	A#-1	A#0												
23	B-1	B0												
24	C0	C1												
25	C#0	C#1												
26	D0	D1												
27	D#0	D#1												
28	E0	E1												
29	F0	F1												
30	F#0	F#1												
31	G0	G1												
32	G#0	G#1												
33	A0	A1												
34	A#0	A#1												
35	B0	B1												
36	C1	C2	Phone Call	●		Cutting Noise	●		Phone Call 2	●		White Noise	●	
37	C#1	C#2	Door Squeak	●		Cutting Noise 2	●		Door Squeak 2	●		Pink Noise	●	
38	D1	D2	Door Slam	●					Door Slam 2	●		White Noise Down 1	●	
39	D#1	D#2	Scratch Cut	●		String Slap	●		Scratch Cut	●		Pink Noise Down 1	●	
40	E1	E2	Scratch H 3	●					Scratch H 3	●		White Noise Down 2	●	
41	F1	F2	Wind Chime	●					Wind Chime	●		Pink Noise Down 2	●	
42	F#1	F#2	Telephone Ring 2	●					Telephone Ring 2	●		White Noise Up 2	●	
43	G1	G2										White Noise Up 1	●	
44	G#1	G#2										Pink Noise Up	●	
45	A1	A2										White Noise Up Release	●	
46	A#1	A#2										Pink Noise Up Release	●	
47	B1	B2										White Noise Up LFO	●	
48	C2	C3										Pink Noise Up LFO	●	
49	C#2	C#3												
50	D2	D3												
51	D#2	D#3												
52	E2	E3	Car Engine Ignition	●		Flute Key Click	●		Car Engine Ignition	●				
53	F2	F3	Car Tires Squeal	●					Car Tires Squeal	●				
54	F#2	F#3	Car Passing	●					Car Passing	●				
55	G2	G3	Car Crash	●					Car Crash	●				
56	G#2	G#3	Siren	●					Siren 2	●				
57	A2	A3	Train	●					Train 2	●				
58	A#2	A#3	Jet Plane	●					Jet Plane 2	●				
59	B2	B3	Starship	●					Starship	●				
60	C3	C4	Burst	●					Burst	●				
61	C#3	C#4	Roller Coaster	●					Roller Coaster	●				
62	D3	D4	Submarine	●					Submarine	●				
63	D#3	D#4												
64	E3	E4												
65	F3	F4												
66	F#3	F#4												
67	G3	G4												
68	G#3	G#4	Laugh	●		Shower 2	●		Laugh	●				
69	A3	A4	Scream	●		Thunder 2	●		Scream 2	●				
70	A#3	A#4	Punch	●		Wind 2	●		Punch 2	●				
71	B3	B4	Heart Beat	●		Stream 2	●		Heart Beat	●				
72	C4	C5	Foot Steps	●		Bubble 2	●		Foot Steps 2	●				
73	C#4	C#5				Feed	●							
74	D4	D5												
75	D#4	D#5												
76	E4	E5												
77	F4	F5												
78	F#4	F#5												
79	G4	G5												
80	G#4	G#5												
81	A4	A5												
82	A#4	A#5												
83	B4	B5												
84	C5	C6	Machine Gun	●		Dog	●		Machine Gun 2	●				
85	C#5	(C#6)	Laser Gun	●		Horse	●		Laser Gun	●				
86	D5	(D6)	Explosion	●		Bird Tweet 2	●		Explosion 2	●				
87	D#5	(D#6)	Firework	●					Firework	●				
88	E5	(E6)												
89	F5	(F6)												
90	F#5	(F#6)				Ghost	●							
91	G5	(G6)				Maou	●							

*1 Key Off: Keys marked “●” stop sounding the instant they are released.
*2 Alternate Group: Playing any instrument within a numbered group will immediately stop the sound of any other instrument in the same group of the same number.

Same as Live! StandardKit1 | No Sound

Bank Select MSB (0-127)			126			126			126		
Bank Select LSB (0-127)			0			0			0		
Program Change (0-127)			35			40			43		
Program Change (1-128)			36			41			44		
Legacy			Legacy								
MIDI		Keyboard Note	ArabicKit	Key Off (*1)	Alternate Group (*2)	Live! CubanKit	Key Off (*1)	Alternate Group (*2)	Live! PopLatinKit	Key Off (*1)	Alternate Group (*2)
Note#	Note										
13	C#-1	C#0							Cajon Low		
14	D-1	D0							Cajon Slap		
15	D#-1	D#0							Cajon Tip		
16	E-1	E0							Claves High		
17	F-1	F0							Claves Low		
18	F#-1	F#0							Hand Clap		
19	G-1	G0									
20	G#-1	G#0							Finger Snap		
21	A-1	A0							Castanet		
22	A#-1	A#0				Conga H Tip			Conga H Tip		
23	B-1	B0				Conga H Heel			Conga H Heel		
24	C0	C1	Nakarazan Dom			Conga H Open			Conga H Open		
25	C#0	C#1	Cabasa			Conga H Mute			Conga H Mute		
26	D0	D1	Nakarazan Edge			Conga H Slap Open			Conga H Slap Open		
27	D#0	D#1	Hager Dom			Conga H Slap			Conga H Slap		
28	E0	E1	Hager Edge			Conga H Slap Mute			Conga H Slap Mute		
29	F0	F1	Bongo H			Conga L Tip			Conga L Tip		
30	F#0	F#1	Bongo L			Conga L Heel			Conga L Heel		
31	G0	G1	Conga H Mute			Conga L Open			Conga L Open		
32	G#0	G#1	Conga H Open			Conga L Mute			Conga L Mute		
33	A0	A1	Conga L			Conga L Slap Open			Conga L Slap Open		
34	A#0	A#1	Zagrouda H			Conga L Slap			Conga L Slap		
35	B0	B1	Zagrouda L	●		Conga L Slide	●		Conga L Slide	●	
36	C1	C2	Kick Soft			Bongo H Open 1 Finger			Bongo H Open 1 finger		
37	C#1	C#2				Bongo H Open 3 Finger			Bongo H Open 3 finger		
38	D1	D2	Snare Soft			Bongo H Rim			Bongo H Rim		
39	D#1	D#2	Arabic Hand Clap			Bongo H Tip			Bongo H Tip		
40	E1	E2	Snare			Bongo H Heel			Bongo H Heel		
41	F1	F2				Bongo H Slap			Bongo H Slap		
42	F#1	F#2				Bongo L Open 1 Finger			Bongo L Open 1 finger		
43	G1	G2				Bongo L Open 3 Finger			Bongo L Open 3 finger		
44	G#1	G#2				Bongo L Rim			Bongo L Rim		
45	A1	A2				Bongo L Tip			Bongo L Tip		
46	A#1	A#2				Bongo L Heel			Bongo L Heel		
47	B1	B2				Bongo L Slap			Bongo L Slap		
48	C2	C3				Timbale L Open			Timbale L Open		
49	C#2	C#3									
50	D2	D3									
51	D#2	D#3									
52	E2	E3	Crash Cymbal 2								
53	F2	F3	Duhulla Dom			Paila L			Paila L		
54	F#2	F#3				Timbale H Open			Timbale H Open		
55	G2	G3	Duhulla Tak								
56	G#2	G#3									
57	A2	A3	Duhulla Sak								
58	A#2	A#3	Claves								
59	B2	B3	Doff Dom			Paila H			Paila H		
60	C3	C4	Katem Dom			Cowbell Top			Cowbell Top		
61	C#3	C#4	Katem Tak						Cowbell 1		
62	D3	D4	Katem Sak						Cowbell 2		
63	D#3	D#4	Katem Tak						Cowbell 3		
64	E3	E4	Doff Tak			Guiro Short			Guiro Short		
65	F3	F4	Tabla Dom			Guiro Long	●		Guiro Long	●	
66	F#3	F#4	Tabla Tak1						Metal Guiro Short		
67	G3	G4	Tabla Tik						Metal Guiro Long	●	
68	G#3	G#4	Tabla Tak2			Tambourine			Tambourine		
69	A3	A4	Tabla Sak						Tambourim Open		
70	A#3	A#4	Tabla Roll of Edge	●					Tambourim Mute		
71	B3	B4	Tabla Flam						Tambourim Tip		
72	C4	C5	Sagat 1			Maracas			Maracas		
73	C#4	C#5	Tabel Dom			Shaker			Shaker		
74	D4	D5	Sagat 3			Cabasa			Cabasa		
75	D#4	D#5	Tabel Tak						Cuica Mute		
76	E4	E5	Sagat 2						Cuica Open		
77	F4	F5	Rik Dom						Cowbell High 1		
78	F#4	F#5	Rik Tak 2						Cowbell High 2		
79	G4	G5	Rik Finger 1						Shekere		
80	G#4	G#5	Rik Tak 1						Shekere Tone		
81	A4	A5	Rik Finger 2						Triangle Mute		1
82	A#4	A#5	Rik Brass Tremolo	●					Triangle Open		1
83	B4	B5	Rik Sak								
84	C5	C6	Rik Tik						Bell Tree		
85	C#5	(C#6)									
86	D5	(D6)									
87	D#5	(D#6)									
88	E5	(E6)									
89	F5	(F6)									
90	F#5	(F#6)									
91	G5	(G6)									

*1 Key Off: Keys marked “●” stop sounding the instant they are released.
*2 Alternate Group: Playing any instrument within a numbered group will immediately stop the sound of any other instrument in the same group of the same number.

Same as Live! StandardKit1   No Sound

Bank Select MSB (0-127)			126			126			126		
Bank Select LSB (0-127)			0			0			0		
Program Change (0-127)			67			109			110		
Program Change (1-128)			68			110			111		
Legacy											
MIDI		Keyboard Note	Live! TurkishKit	Key Off (*1)	Alternate Group (*2)	Live! VocalEffectsKit	Key Off (*1)	Alternate Group (*2)	Live! GospelAdLibs	Key Off (*1)	Alternate Group (*2)
Note#	Note										
13	C#-1	C#0	Asma Davul Left Side								
14	D-1	D0	Asma Davul Right Side								
15	D#-1	D#0	Asma Davul Side Body								
16	E-1	E0	Asma Davul Both Sides								
17	F-1	F0	Koltuk Davul Open Flam								
18	F#-1	F#0	Koltuk Davul Teke Open								
19	G-1	G0	Koltuk Davul Tek Open								
20	G#-1	G#0	Koltuk Davul Dum								
21	A-1	A0	Bendir Teke Open Flam								
22	A#-1	A#0	Bendir Teke Dead								
23	B-1	B0	Bendir Tek Dead								
24	C0	C1	Bendir Teke								
25	C#0	C#1	Bendir Tek								
26	D0	D1	Bendir Slap		2						
27	D#0	D#1	Bendir Dum		2						
28	E0	E1	Zil Right Close		3						
29	F0	F1	Zil Right Open		3						
30	F#0	F#1	Zil Left Close		4						
31	G0	G1	Zil Left Open		4						
32	G#0	G#1	Tef Teke Flam		5						
33	A0	A1	Tef Tek Mute		5						
34	A#0	A#1	Tef Teke Damped								
35	B0	B1	Tef Tek Mute Medium								
36	C1	C2	Tef Dum Mute			Male "Ha" 01	●				
37	C#1	C#2	Tef Cymbal		9	Female "Ha" 01	●				
38	D1	D2	Tef Cymbal Mute		9	Male "Ha" 02	●				
39	D#1	D#2	Tef Tremolo	●		Male "Ha" 03	●				
40	E1	E2	Tef Shake 1			Male "Bh" 01	●				
41	F1	F2	Tef Shake 2			Female "Bh" 01	●				
42	F#1	F#2	Tef Tek Flam			Male "Kh" 01	●				
43	G1	G2	Tef Full Open			Female "Kh" 01	●				
44	G#1	G#2	Tef Teke Open Short			Male "Ph" 01	●				
45	A1	A2	Tef Tek Open Short			Female "Ph" 01	●				
46	A#1	A#2	Tef Tek Open			Male "Th" 01	●				
47	B1	B2	Tef Dum Open			Female "Th" 01	●				
48	C2	C3	Hollo Finger Dead			Male "Bh" 02	●		C'mon	●	
49	C#2	C#3	Hollo Slap			Female "Bh" 02	●		Hoo!	●	
50	D2	D3	Hollo Dum			Male "Kh" 02	●		Aha!	●	
51	D#2	D#3	Kasik		1	Female "Kh" 02	●		Oh Yeah	●	
52	E2	E3	Kasik Flam		1	Male "Ph" 02	●		Yayayayayah	●	
53	F2	F3	Bass Darbuka Tek Dead			Female "Ph" 02	●		Put Your Hands Together	●	
54	F#2	F#3	Bass Darbuka Tek Flam			Male "Th" 02	●		C'mon Now	●	
55	G2	G3	Bass Darbuka Teke			Female "Th" 02	●		Heeey	●	
56	G#2	G#3	Bass Darbuka Teke Other Finger			Male "Ha" 04	●		Everybody Now	●	
57	A2	A3	Bass Darbuka Teke Index Finger			Female "Ha" 02	●		Clap Your Hands, Everybody C'mon	●	
58	A#2	A#3	Bass Darbuka Tek			Male "Ha" 05	●		With All Your Soul	●	
59	B2	B3	Bass Darbuka Slap			Male "Ha" 06	●		Stand Up On Your Feet	●	
60	C3	C4	Bass Darbuka Slap Medium		7	Male "Bh" 03	●		Uhh Yeah	●	
61	C#3	C#4	Bass Darbuka Dum		7	Female "Bh" 03	●		Aaoh	●	
62	D3	D4	Darbuka Roll Close	●	6	Male "Kh" 03	●		Come On!	●	
63	D#3	D#4	Darbuka Roll Open	●	6	Female "Kh" 03	●		Yeah!	●	
64	E3	E4	Darbuka Teke Damped Flam			Male "Ph" 03	●		Alright Now!	●	
65	F3	F4	Darbuka Tek Dead			Female "Ph" 03	●		One	●	
66	F#3	F#4	Darbuka Tek Damped			Male "Th" 03	●		Two	●	
67	G3	G4	Darbuka Teke Open Flam			Female "Th" 03	●		Three	●	
68	G#3	G#4	Darbuka Teke Open			Male "Bh" 04	●		Four	●	
69	A3	A4	Darbuka Teke Other Finger 1			Female "Bh" 04	●		One!	●	
70	A#3	A#4	Darbuka Teke Index Finger 1			Male "Kh" 04	●		Two!	●	
71	B3	B4	Darbuka Tek 1			Female "Kh" 04	●		Three!	●	
72	C4	C5	Darbuka Teke Other Finger 2			Male "Ph" 04	●		Four!	●	
73	C#4	C#5	Darbuka Teke Index Finger 2			Female "Ph" 04	●		Five!	●	
74	D4	D5	Darbuka Tek 2			Male "Th" 04	●		Six!	●	
75	D#4	D#5	Darbuka Slap Medium			Female "Th" 04	●		Seven!	●	
76	E4	E5	Darbuka Slap		8				Eight!	●	
77	F4	F5	Darbuka Dum		8				Clap!	●	
78	F#4	F#5	Bongo Tek Roll	●					Gospel Clap 1	●	
79	G4	G5	Bongo Flam						Gospel Clap 2	●	
80	G#4	G#5	Bongo Tek Flam								
81	A4	A5	Bongo Tek								
82	A#4	A#5	Bongo Slap								
83	B4	B5	Bongo Flam Hi								
84	C5	C6	Bongo Dum								
85	C#5	(C#6)									
86	D5	(D6)									
87	D#5	(D#6)									
88	E5	(E6)									
89	F5	(F6)									
90	F#5	(F#6)									
91	G5	(G6)									

*1 Key Off: Keys marked "●" stop sounding the instant they are released.
*2 Alternate Group: Playing any instrument within a numbered group will immediately stop the sound of any other instrument in the same group of the same number.

Same as Live! StandardKit1   No Sound

GM2 Drum Kit / SFX Kit

Bank Select MSB (0-127)			120			120			120			120		
Bank Select LSB (0-127)			0			0			0			0		
Program Change (0-127)			0			8			16			24		
Program Change (1-128)			1			9			17			25		
Legacy														
MIDI		Keyboard Note	StandardSet	Key Off (*1)	Alternate Group (*2)	RoomSet	Key Off (*1)	Alternate Group (*2)	PowerSet	Key Off (*1)	Alternate Group (*2)	ElectronicSet	Key Off (*1)	Alternate Group (*2)
Note#	Note													
13	C#-1	C#0												
14	D-1	D0												
15	D#-1	D#0												
16	E-1	E0												
17	F-1	F0												
18	F#-1	F#0												
19	G-1	G0												
20	G#-1	G#0												
21	A-1	A0												
22	A#-1	A#0												
23	B-1	B0												
24	C0	C1												
25	C#0	C#1												
26	D0	D1												
27	D#0	D#1	High Q											
28	E0	E1	Slap											
29	F0	F1	Scratch Push		7									
30	F#0	F#1	Scratch Pull		7									
31	G0	G1	Sticks											
32	G#0	G#1	Square Click											
33	A0	A1	Metronome Click											
34	A#0	A#1	Metronome Bell											
35	B0	B1	Acoustic Bass Drum											
36	C1	C2	Bass Drum 1						Power Kick Drum			Electric Bass Drum		
37	C#1	C#2	Side Stick											
38	D1	D2	Acoustic Snare						Power Snare Drum			Electric Snare 1		
39	D#1	D#2	Hand Clap											
40	E1	E2	Electric Snare									Electric Snare 2		
41	F1	F2	Low Floor Tom			Room Low Tom 2			Power Low Tom 2			Electric Low Tom 2		
42	F#1	F#2	Closed Hi-hat		1									
43	G1	G2	High Floor Tom			Room Low Tom 1			Power Low Tom 1			Electric Low Tom 1		
44	G#1	G#2	Pedal Hi-hat		1									
45	A1	A2	Low Tom			Room Mid Tom 2			Power Mid Tom 2			Electric Mid Tom 2		
46	A#1	A#2	Open Hi-hat		1									
47	B1	B2	Low-Mid Tom			Room Mid Tom 1			Power Mid Tom 1			Electric Mid Tom 1		
48	C2	C3	High Mid Tom			Room Hi Tom 2			Power Hi Tom 2			Electric Hi Tom 2		
49	C#2	C#3	Crash Cymbal 1											
50	D2	D3	High Tom			Room Hi Tom 1			Power Hi Tom 1			Electric Hi Tom 1		
51	D#2	D#3	Ride Cymbal 1											
52	E2	E3	Chinese Cymbal									Reverse Cymbal		
53	F2	F3	Ride Bell											
54	F#2	F#3	Tambourine											
55	G2	G3	Splash Cymbal											
56	G#2	G#3	Cowbell											
57	A2	A3	Crash Cymbal 2											
58	A#2	A#3	Vibra-slap											
59	B2	B3	Ride Cymbal 2											
60	C3	C4	High Bongo											
61	C#3	C#4	Low Bongo											
62	D3	D4	Mute Hi Conga											
63	D#3	D#4	Open Hi Conga											
64	E3	E4	Low Conga											
65	F3	F4	High Timbale											
66	F#3	F#4	Low Timbale											
67	G3	G4	High Agogo											
68	G#3	G#4	Low Agogo											
69	A3	A4	Cabasa											
70	A#3	A#4	Maracas											
71	B3	B4	Short Whistle		2									
72	C4	C5	Long Whistle		2									
73	C#4	C#5	Short Guiro		3									
74	D4	D5	Long Guiro		3									
75	D#4	D#5	Claves											
76	E4	E5	Hi Wood Block											
77	F4	F5	Low Wood Block											
78	F#4	F#5	Mute Cuica		4									
79	G4	G5	Open Cuica		4									
80	G#4	G#5	Mute Triangle		5									
81	A4	A5	Open Triangle		5									
82	A#4	A#5	Shaker											
83	B4	B5	Jingle Bell											
84	C5	C6	Bell Tree											
85	C#5	(C#6)	Castanets											
86	D5	(D6)	Mute Surdo		6									
87	D#5	(D#6)	Open Surdo		6									
88	E5	(E6)												
89	F5	(F6)												
90	F#5	(F#6)												
91	G5	(G6)												

*1 Key Off: Keys marked “●” stop sounding the instant they are released.
*2 Alternate Group: Playing any instrument within a numbered group will immediately stop the sound of any other instrument in the same group of the same number.

Same as StandardSet   No Sound

Bank Select MSB (0-127)			120			120			120			120		
Bank Select LSB (0-127)			0			0			0			0		
Program Change (0-127)			25			32			40			48		
Program Change (1-128)			26			33			41			49		
Legacy														
MIDI		Keyboard Note	AnalogSet	Key Off (*1)	Alternate Group (*2)	JazzSet	Key Off (*1)	Alternate Group (*2)	BrushSet	Key Off (*1)	Alternate Group (*2)	OrchestraSet	Key Off (*1)	Alternate Group (*2)
Note#	Note													
13	C#-1	C#0												
14	D-1	D0												
15	D#-1	D#0												
16	E-1	E0												
17	F-1	F0												
18	F#-1	F#0												
19	G-1	G0												
20	G#-1	G#0												
21	A-1	A0												
22	A#-1	A#0												
23	B-1	B0												
24	C0	C1												
25	C#0	C#1												
26	D0	D1												
27	D#0	D#1										Closed Hi-hat 2		1
28	E0	E1										Pedal Hi-hat		1
29	F0	F1										Open Hi-hat 2		1
30	F#0	F#1										Ride Cymbal 1		
31	G0	G1												
32	G#0	G#1												
33	A0	A1												
34	A#0	A#1												
35	B0	B1										Concert BD 2		
36	C1	C2	Analog Bass Drum			Jazz Kick 2			Jazz Kick 2			Concert BD 1		
37	C#1	C#2	Analog Rim Shot			Jazz Kick 1			Jazz Kick 1					
38	D1	D2	Analog Snare 1									Concert SD		
39	D#1	D#2							Brush Tap			Castanets		
40	E1	E2							Brush Slap			Concert SD		
41	F1	F2	Analog Low Tom 2						Brush Swirl			Timpani F		
42	F#1	F#2	Analog CHH 1		1							Timpani F#		
43	G1	G2	Analog Low Tom 1									Timpani G		
44	G#1	G#2	Analog CHH 2		1							Timpani G#		
45	A1	A2	Analog Mid Tom 2									Timpani A		
46	A#1	A#2	Analog OHH		1							Timpani A#		
47	B1	B2	Analog Mid Tom 1									Timpani B		
48	C2	C3	Analog Hi Tom 2									Timpani c		
49	C#2	C#3	Analog Cymbal									Timpani c#		
50	D2	D3	Analog Hi Tom 1									Timpani d		
51	D#2	D#3										Timpani d#		
52	E2	E3										Timpani e		
53	F2	F3										Timpani f		
54	F#2	F#3												
55	G2	G3												
56	G#2	G#3	Analog Cowbell											
57	A2	A3										Concert Cymbal 2		
58	A#2	A#3												
59	B2	B3										Concert Cymbal 1		
60	C3	C4												
61	C#3	C#4												
62	D3	D4	Analog High Conga											
63	D#3	D#4	Analog Mid Conga											
64	E3	E4	Analog Low Conga											
65	F3	F4												
66	F#3	F#4												
67	G3	G4												
68	G#3	G#4												
69	A3	A4												
70	A#3	A#4	Analog Maracas											
71	B3	B4												
72	C4	C5												
73	C#4	C#5												
74	D4	D5												
75	D#4	D#5	Analog Claves											
76	E4	E5												
77	F4	F5												
78	F#4	F#5												
79	G4	G5												
80	G#4	G#5												
81	A4	A5												
82	A#4	A#5												
83	B4	B5												
84	C5	C6												
85	C#5	(C#6)												
86	D5	(D6)												
87	D#5	(D#6)												
88	E5	(E6)										Applause	●	
89	F5	(F6)												
90	F#5	(F#6)												
91	G5	(G6)												

*1 Key Off: Keys marked “●” stop sounding the instant they are released.
*2 Alternate Group: Playing any instrument within a numbered group will immediately stop the sound of any other instrument in the same group of the same number.

Same as StandardSet   No Sound

Bank Select MSB (0-127)			120		
Bank Select LSB (0-127)			0		
Program Change (0-127)			56		
Program Change (1-128)			57		
Legacy					
MIDI		Keyboard Note	SFXSet	Key Off (*1)	Alternate Group (*2)
Note#	Note				
13	C#-1	C#0			
14	D-1	D0			
15	D#-1	D#0			
16	E-1	E0			
17	F-1	F0			
18	F#-1	F#0			
19	G-1	G0			
20	G#-1	G#0			
21	A-1	A0			
22	A#-1	A#0			
23	B-1	B0			
24	C0	C1			
25	C#0	C#1			
26	D0	D1			
27	D#0	D#1			
28	E0	E1			
29	F0	F1			
30	F#0	F#1			
31	G0	G1			
32	G#0	G#1			
33	A0	A1			
34	A#0	A#1			
35	B0	B1			
36	C1	C2			
37	C#1	C#2			
38	D1	D2			
39	D#1	D#2	High Q		
40	E1	E2	Slap		
41	F1	F2	Scratch Push		7
42	F#1	F#2	Scratch Pull		7
43	G1	G2	Sticks		
44	G#1	G#2	Square Click		
45	A1	A2	Metronome Click		
46	A#1	A#2	Metronome Bell		
47	B1	B2	Guitar Fret	●	
48	C2	C3	Guitar Cutting Noise Up	●	
49	C#2	C#3	Guitar Cutting Noise Down	●	
50	D2	D3	String Slap of Double Bass	●	
51	D#2	D#3	Fl.Key Click	●	
52	E2	E3	Laughing	●	
53	F2	F3	Scream	●	
54	F#2	F#3	Punch	●	
55	G2	G3	Heart Beat	●	
56	G#2	G#3	Footsteps 1	●	
57	A2	A3	Footsteps 2	●	
58	A#2	A#3	Applause	●	
59	B2	B3	Door Creaking	●	
60	C3	C4	Door	●	
61	C#3	C#4	Scratch	●	
62	D3	D4	Wind Chimes	●	
63	D#3	D#4	Car-Engine	●	
64	E3	E4	Car-Stop	●	
65	F3	F4	Car-Pass	●	
66	F#3	F#4	Car-Crash	●	
67	G3	G4	Siren	●	
68	G#3	G#4	Train	●	
69	A3	A4	Jetplane	●	
70	A#3	A#4	Helicopter	●	
71	B3	B4	Starship	●	
72	C4	C5	Gun Shot	●	
73	C#4	C#5	Machine Gun	●	
74	D4	D5	Lasergun	●	
75	D#4	D#5	Explosion	●	
76	E4	E5	Dog	●	
77	F4	F5	Horse-Gallop	●	
78	F#4	F#5	Birds	●	
79	G4	G5	Rain	●	
80	G#4	G#5	Thunder	●	
81	A4	A5	Wind	●	
82	A#4	A#5	Seashore	●	
83	B4	B5	Stream	●	
84	C5	C6	Bubble	●	
85	C#5	(C#6)			
86	D5	(D6)			
87	D#5	(D#6)			
88	E5	(E6)			
89	F5	(F6)			
90	F#5	(F#6)			
91	G5	(G6)			

*1 Key Off: Keys marked "●" stop sounding the instant they are released.
*2 Alternate Group: Playing any instrument within a numbered group will immediately stop the sound of any other instrument in the same group of the same number.

Same as StandardSet   No Sound

Category	Style Name
Pop&Rock	StadiumRock
	70'sRock
	70'sRockShuffle
	SurfRock
	BeachRock
	60'sRisingPop
	60'sUnderground
	70'sRockBros
	OrchRockBallad
	BigRockBallad
	HardRock
	80'sPowerRock
	80'sPopRock
	80'sGuitarPop
	BritRockPop
	EasyPop
	Live8Beat
	Classic8Beat
	Cool8Beat
	JerseyPop
	90'sPopShuffle
	00'sBoyBand
	60'sVintageRock
	60'sPianoPop
	60'sVintagePop
	80'sSynthRock
	80'sPop
	ContempPop
	ChartPianoShfl
	ChartRockShfl
	6-8Rock
	90'sRockBallad
	ContempRockBld
	VintageGtrPop
	Straight8Pop
	StandardRock
	ContempRock
	AcousticRock
	FunkPopRock
	PowerRock
	80's8Beat
	Uptempo8Beat
	8BeatModern
	WestCoastPop
	UKSoulPop
	BritPop
	BritPopSwing
	60'sChartSwing
	60'sPopRock
	SoftRock
	70's8Beat
	60's8Beat
	60'sGuitarPop
	BubblegumPop
	90'sGuitarPop
	FusionShuffle
	PopShuffle
	KoolShuffle
	JazzPop
	Classic16Beat
	CaribbeanRock
	Unplugged
	RockShuffle
	ChartGuitarPop
	8BeatGtrPop
	ScandPopShuffle
Ballad	BoyBandBallad
	70'sCoolBallad
	70'sPopDuo1
	70'sPopDuo2
	70'sR&BPopBld
	VocalPopBallad
	PopEvergreen
	80'sAnalogBallad
	Modern16BtBld
	Acoustic8BtBld
	ChillPerformer
	CoudyBay
	NightWalk
	Play4Sofa
	AngelSun
	ModernPopBld
	SoulR&B
	70'sGlamPiano
	70'sChartBallad
	ChilloutCafe
	RomanticWaltz
	PopGtrBallad
	EasyBallad
	EPBallad
	16BeatBallad
	90'sCoolBallad
	80'sSmoothBld
	R&BSoulBallad
	8BeatBallad1
	8BeatBallad2
	PowerBallad

Category	Style Name
Ballad	EpicBallad
	80'sEPBallad
	Chillout1
	Chillout2
	80'sBoyBand
	80'sMovieBallad
	ContempPopBld
	PopPianoBallad
	PopWaltz
	6-8SlowRock1
	6-8SlowRock2
	6-8Modern
	6-8Orchestral
	12-8Ballad
	OrganBallad
	PianoBallad
	RomanticBallad
	AnalogBallad
	LoveSong
	NewR&BBallad
	ChartBallad
	Slow&Easy
	AcousticBallad
	GuitarSerenade
Dance	GlobalDJ's
	Ibiza2010
	Dancefloor
	FrenchClub
	DeepHousePop
	PopLegend
	FunkDisco
	80'sSynthDisco
	SynthPop
	FunkyHouse
	Electronica
	ModernHipHop
	Clubdance1
	Clubdance2
	DirtyPop
	70'sDisco1
	70'sDisco2
	70'sDiscoFunk
	80'sDisco
	90'sDisco
	DreamDance
	TrancePop
	DiscoTeens
	EuroTrance
	CelticTrance
	USHipHop
	ClassicHipHop
	NewHipHop
	EuroHipHop
	TripHop
	DiscoPhilly
	DiscoHouse
	ClubHouse
	RetroPop
	TechnoParty
	Garage
	Dancehall
	Groundbeat
	ChartPop1
	ChartPop2
	PopR&B
	NewR&B
	ChartR&B
	DiscoChocolate
	6-8Trance
Swing&Jazz	TheJazzSingers
	BigBandJazz
	ModBigBandShfl
	ModBigBandBld
	ModernBigBand
	ManhattanSwing
	InstrumentalJazz
	AcousticJazz
	CoolPianoJazz
	JazzGuitarClub
	40'sSwingBallad
	DreamyBallad
	OrchestralBallad
	MidnightSwing
	ClassicBigBand
	JazzWaltzSlow
	JazzWaltzMed
	JazzWaltzFast
	OrchestraSwing1
	OrchestraSwing2
	OrchBigBand1
	TradPianoJazz
	CoolJazzBallad
	ModernJazzBld
	EasyListening
	OrchBigBand2
	TradPianoBallad
	MORSwing

Category	Style Name
Swing&Jazz	Bebop
	LACoolSwing
	BigBandFast1
	BigBandMed1
	JazzClub
	OrganCombo
	AfroCuban
	BigBandFast2
	BigBandMed2
	Swingin'BigBand
	30'sBigBand
	MoonlightBallad
	Dixieland
	Charleston
	FrenchJazz
	Ragtime1
	Ragtime2
	Five-Four
	OrganGroove
	JumpJive
R&B	CoolR&B
	70'sScatLegend
	70'sChartSoul
	ModernShuffle
	BluesRock
	HollywoodGospel
	GospelParty
	AmazingGospel
	GospelBallad
	Let'sFunk
	50'sRock&Roll
	60'sRock&Roll
	Rock&Roll1
	Rock&Roll2
	Rock&RollShfl
	JazzFunk
	LiveSoulBand
	6-8Soul
	MotorCity
	SlowBlues
	GospelSwing
	GospelSisters
	SouthernGospel
	GospelBrothers
	GospelFunk
	WorshipSlow
	WorshipMed
	WorshipFast
	WorshipIrishRk
	Worship6-8
	Swingin'Boogie
	OldiesR&R
	Skiffle
	PianoBoogie
	Twist
	SoulBrothers
	FranklySoul
	SoulSwing
	SoulShuffle
	Soul
	DetroitPop1
	DetroitPop2
	LovelyShuffle
	KoolFunk
	ShuffleBlues
	BlueberryBlues
	CrocoTwist
	SoulBeat
	WorshpPowerBld
	ModernR&B
Country	CountryBlues
	ModernPickin
	Pickin'Swing
	CaliCountry
	CountryBallad
	70'sCountryPop
	70'sChartCntry
	EasyCountry
	CountryHits
	Country8Beat
	ModBluegrass
	Bluegrass
	Hoedown
	ModCountryBld1
	ModCountryBld2
	NewCountry
	CountryShuffle
	CntrySing-along
	CountryStrum
	CountryWaltz
	CountryStraits
	Country2-4
	CountryTwoStep
	CountryBrothers
	CountryPop
	CountrySwing1
	CountrySwing2

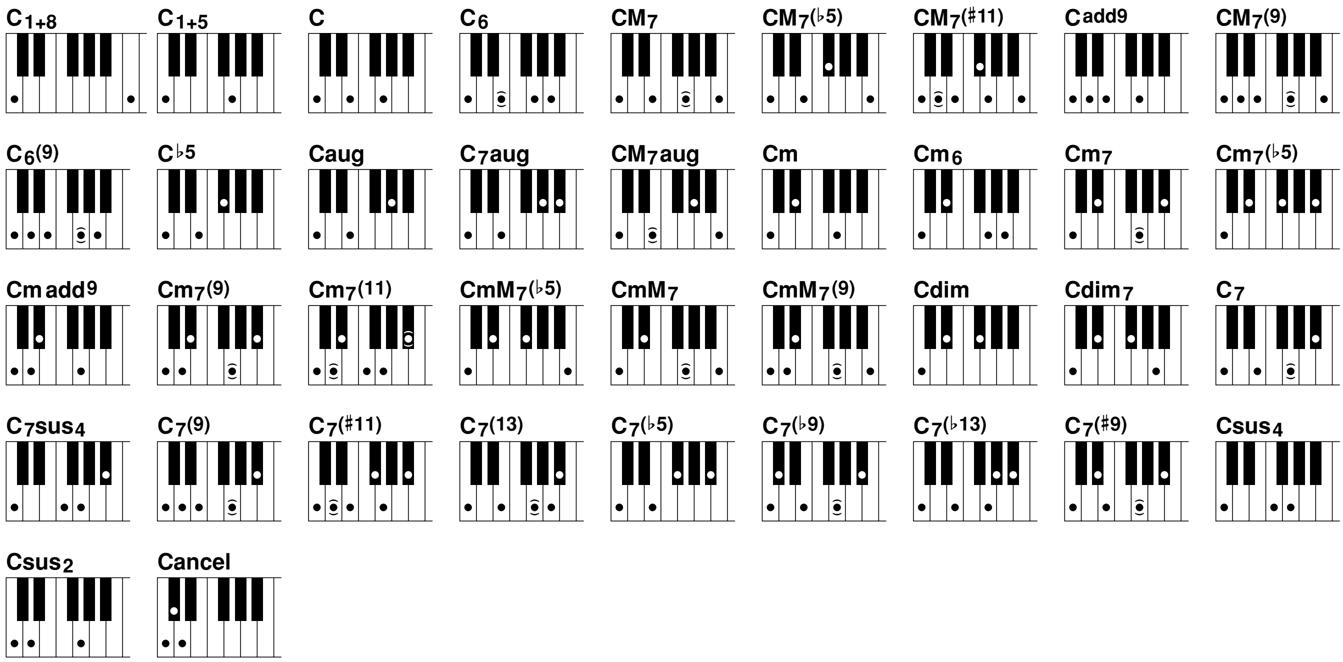
Category	Style Name
Country	CountryRockBld
	CountryRock
	ModernCntryPop
	FolkPop
	SingerSongWriter
	FingerPickin
Latin	JazzSamba
	BossaBrazil
	BrazilianSamba
	BossaNova
	FastBossa
	LatinPartyPop
	LoungeBossa
	SheriffReggae
	HappyReggae
	PopLatinBallad
	Bomba
	Salsa
	Guijira
	Guaguanco
	CubanSon
	BoleroLento
	Merengue
	Bachata
	RumbaFlamenco
	Cumbia
	Danzon
	Vallenato4-4
	Calypso
	PopLatin
	OrchestralBossa
	LatinDisco1
	LatinDisco2
	RockChaCha
	PopBossa1
	PopBossa2
	SlowBossa
	OrganBossa
	Beguine
	GuitarRumba
	BigBandSamba
	BigBandMambo
	BigBandSalsa
	RumbaIsland
	PopRumba
Ballroom	VienneseWaltz1
	VienneseWaltz2
	VocalWaltz
	SlowWaltz
	EnglishWaltz
	VocalFoxtrot
	Slowfox
	Foxtrot
	Quickstep
	Swingfox
	Tango1
	Tango2
	Pasodoble
	Samba
	ChaChaCha
	Rumba
	Jive
	OrganChaCha
	OrganSwing
	OrganSamba
	OrganQuickstep
	OrganRumba
	TheatreFoxtrot
	TheatreQuickstep
	TheatreMarch
	9-8Waltz
	SwingWaltz
Movie&Show	MovieSoundtrack
	EtherealMovie
	EtherealVoices
	ChoralSymphony
	ChoirSoundtrack
	OnBroadway
	BigScreenClassic
	Blockbuster
	Sci-fiMarch
	SecretService
	StringConcerto
	StringAdagio
	RomanticBallet
	GreenFantasia
	BaroqueConcerto
	BaroqueAir
	ClassicalMenuet
	ClassicalSerenad
	BroadwayBallad
	Moonlight6-8
	OrchestralBolero
	OrchestralMarch
	OrchestralPolka
	PopClassics
	AniFantasy
Movie&Show	MovieSwing1
	MovieSwing2
	MovieBallad
	MovieDisco
	SaturdayNight
	ClassicPianoBld
	AnimationBallad
	70'sTVTheme
	WildWest
	Showtune
	French50's
	TapDanceSwing
	CelticXmas
	ChristmasShuffle
	ChristmasBallad
	ChristmasSwing1
	ChristmasSwing2
	ChristmasWaltz
	MoviePanther
Entertainer	DiscoFoxRock
	MallorcaParty
	MallorcaDisco
	ApresSkiHit
	PartyArena
	SchlagerFever
	SchlagerPalace
	AlpenSchlager
	SoftSchlager
	SynthPopDuo
	GermanRock
	DiscoFox
	SchlagerFox
	SchlagerWaltz
	EuroPopOrgan
	AlpBallad1
	AlpBallad2
	70'sFrenchHit
	Schlager6-8
	SchlagerPolka
	ScandShuffle
	ScandCountry1
	ScandCountry2
	ScandSlowRock
	ScandBugg
	SchlagerSamba
	SchlagerShuffle
	SchlagerItalia
	SchlagerRock
	SchlagerAlp
	SchlagerPop
	SchlagerBeat
	SchlagerRumba
	PartyPolka
	Tijuana
	AlpRock
	Sing-a-longPiano
	PubPiano
	8BeatAdria
	PolkaPop
	DiscoHands
	Caribbean
World	BohemianWaltz
	ZitherPolka
	AlpenLand4-4
	AlpenLand3-4
	Sirtaki
	BrassBandHymn
	CelticDance3-4
	IrishHymn1
	IrishHymn2
	IrishDance
	Flamenco
	SpanishPaso
	PopFlamenco
	FrenchMusette
	ItalianMazurka
	TurkishEuro1
	TurkishEuro2
	Saeidy
	Zouk
	Hawaiian
	HighlandWaltz
	ItalianWaltz
	FrenchWaltz
	ScandWaltz
	MariachiWaltz
	OrientalPop
	CelticDance
	GermanWaltz
	OberPolka1
	OberWalzer1
	MexicanDance
	ItalianPolka
	ItalianTango
	Strathspey
	Reel
	Jig
World	GayGordons
	Tarantella
	ScandHambo
	ScandSchottis
	USMarch
	6-8March
	BrassBand
	GermanMarch1
	GermanMarch2
	Norteno
	BandaPolka
	BandaVals
	OberPolka2
	OberWalzer2
	HullyGully

Order	Bank Name
1	PopOoh p
2	PopOoh pVib
3	PopOoh f
4	PopOoh fVib
5	PopPad
6	PopAah p
7	PopAah pVib
8	PopAah f
9	PopAah fVib
10	PopVocalPhrase
11	50sPopVocal
12	60sPopVocal
13	DooWop1
14	DooWop2
15	LatinVocalFX
16	BossaVocal1
17	BossaVocal2
18	CountIn1
19	CountIn2
20	CountIn3
21	GspAdlibs1
22	GspAdlibs2
23	GspChoirFX1
24	GspChoirFX2
25	GspSoloFX1
26	GspSoloFX2
27	GspChoirOnBeat
28	GspChoirOffBeat
29	Wooshes1
30	Wooshes2
31	WeatherFX
32	HorrorShowFX
33	OrdnanceFX
34	TransportFX
35	AmbienceFX
36	E.Gtr16BtCut1
37	E.Gtr16BtCut2
38	E.Gtr16BtCut3
39	FunkyGtr16Bt1
40	FunkyGtr16Bt2
41	FunkyGtr16Bt3
42	DiscoGuitar
43	E.Gtr16BtShfl1
44	E.Gtr16BtShfl2
45	E.Gtr16BtPick
46	SteelTriplet1
47	SteelTriplet2
48	E.Gtr8BtShfl
49	SteelGuitar6-8
50	E.Guitar6-8
51	SteelGtrPick1
52	SteelGtrPick2
53	SteelGtrPick3
54	SteelGtrPick4
55	NylonGtrPick
56	NylonAccomp
57	NylonBossa1
58	NylonBossa2
59	FlamencoGtr
60	A.GtrAccomp
61	Steel8BtStrum1
62	Steel8BtStrum2
63	SteelBsChdSlow
64	SteelBsChdFast
65	ReggaeAccomp
66	E.Gtr8BtStrm1
67	E.Gtr8BtStrm2
68	E.GtrRock1
69	E.GtrRock2
70	OrganBlues
71	BoogieLoops
72	LatinKeys
73	BaroqueStrings
74	StringsArpeggio
75	StrRun&Fall
76	StringBallad
77	FolkDance
78	StringLegato
79	OrchMarch
80	Classical
81	TrumpetSwing
82	BrassSwing
83	BigBandSwing1
84	BigBandSwing2
85	BigBandSwing3
86	JazzGtrSwing
87	Brass8Beat
88	BrassChords1
89	BrassChords2
90	BrassChords3

Order	Bank Name
91	Falls
92	SynthBrassSlide
93	OrchestraHit
94	Comedy
95	AttentionDuo
96	Fanfare
97	PianoGlissando
98	Cym&Chimes
99	DrumEndings
100	SynthToms
101	PianoArp16Bt
102	PianoArp8Bt
103	HeavenArpegio
104	TwinkleArpegio
105	TechSeq1
106	TechSeq2
107	TranceSeq1
108	TranceSeq2
109	Harpeggio1
110	Harpeggio2
111	LatinPerc1
112	LatinPerc2
113	LatinPerc3
114	LatinPerc4
115	LatinPerc5
116	Conga&Bongo1
117	CarnivalDeRio
118	LatinPop
119	Rumba&Soca
120	SambaPerc
121	Oriental1
122	Oriental2
123	Oriental3
124	Oriental4
125	Oriental5
126	Oriental6
127	Oriental7
128	Oriental8
129	TurkishPerc1
130	TurkishPerc2
131	SnarePlay1
132	SnarePlay2
133	Cajon1
134	Cajon2
135	Shaker&Tamb
136	Timbales&Tom
137	EthnicPerc
138	BigBells
139	MagicBells
140	XmasLoops
141	CrashCymbals
142	PowerToms
143	PowerSnares
144	PowerKit1
145	PowerKit2
146	BrushHits
147	DanceKit
148	LatinKit1
149	LatinKit2
150	LatinKit3
151	DanceMix1
152	DanceMix2
153	BreakBeatz
154	DJ-BasicSet
155	DJ-SFX
156	HipHop1
157	HipHop2
158	HeavyShuffle
159	NewR&B
160	ScratchBank
161	Breathing
162	ArabicPerc1
163	ArabicPerc2
164	Conga&Bongo2

Operation: [DIRECT ACCESS] button + button/controller listed below		Function of the accessed LCD display			
STYLE CONTROL	ACMP	FUNCTION	STYLE SETTING/SPLIT POINT/ CHORD FINGERING	CHORD FINGERING	FINGERING TYPE SETTING
	OTS LINK			STYLE SETTING	SYNCHRO STOP WINDOW SETTING
	AUTO FILL IN			CHORD FINGERING	FINGERING TYPE SETTING
	INTRO I	MIXING CONSOLE		VOL/VOICE (STYLE)	VOICE
	INTRO II				PANPOD
	INTRO III				VOLUME
	MAIN A			FILTER (STYLE)	HARMONIC CONTENT
	MAIN B				BRIGHTNESS
	MAIN C				REVERB
	MAIN D				CHORUS
	BREAK				DSP
	ENDING/rit. I			EQ (STYLE)	EQ HIGH
	ENDING/rit. II				EQ LOW
	ENDING/rit. III			MASTER COMP	
	SYNC STOP	FUNCTION	STYLE SETTING/SPLIT POINT/ CHORD FINGERING	STYLE SETTING	SYNCHRO STOP WINDOW SETTING
	SYNC START			SPLIT POINT	SPLIT POINT (ACMP) SETTING
	START/STOP			STYLE SETTING	SYNCHRO STOP WINDOW SETTING
STYLE	POP & ROCK	MIXING CONSOLE		VOL/VOICE (STYLE)	VOICE
	BALLAD				PANPOD
	DANCE				VOLUME
	SWING & JAZZ			FILTER (STYLE)	HARMONIC CONTENT
	R&B				BRIGHTNESS
	COUNTRY			EFFECT (STYLE)	REVERB
	LATIN				CHORUS
	BALLROOM				DSP
	MOVIE & SHOW			EQ (STYLE)	EQ HIGH
	ENTERTAINER				EQ LOW
	WORLD			EQ	MASTER EQ EDIT
	FILE ACCESS			LINE OUT	LINE OUT PANEL
SONG	I	MIXING CONSOLE		VOL/VOICE (SONG 1–8)	VOICE
	II			FILTER (SONG 1–8)	HARMONIC CONTENT
	III			VOL/VOICE (SONG 9–16)	VOICE
	IV			FILTER (SONG 9–16)	HARMONIC CONTENT
	SP1			EFFECT (SONG 1–8)	REVERB
	SP2			EQ (SONG 1–8)	EQ HIGH
	SP3			EFFECT (SONG 9–16)	REVERB
	SP4			EQ (SONG 9–16)	EQ HIGH
	LOOP	FUNCTION	SONG SETTING		LYRICS LANGUAGE SETTING
	REC				
	STOP				
	PLAY/PAUSE				
	REW				
	FF				
	LYRICS/TEXT				
	SCORE				
TIMING	TAP TEMPO	FUNCTION	UTILITY	CONFIG 1	TAP SETTING
	TEMPO +		MIDI TEMPLATE EDIT	SYSTEM	MIDI CLOCK SETTING
	TEMPO -		STYLE SETTING/SPLIT POINT/ CHORD FINGERING	STYLE SETTING	SYNCHRO STOP WINDOW SETTING
	METRONOME		UTILITY	CONFIG 1	VOLUME SETTING
	FADE IN/OUT				FADE IN/OUT SETTING
TRANSPOSE	+	MIXING CONSOLE		TUNE	TRANSPOSE
	-	FUNCTION	CONTROLLER	KEYBOARD/PANEL	TRANSPOSE ASSIGNMENT
UPPER OCTAVE	+	MIXING CONSOLE		TUNE	OCTAVE
	-				
AUDIO RECORDER/ PLAYER	REC	FUNCTION	UTILITY	CONFIG 1	FADE IN/OUT SETTING
	STOP			CONFIG 2	SPEAKER SETTING
	PLAY/PAUSE			MEDIA	
	PREV			OWNER	LANGUAGE SETTING
	NEXT			SYSTEM RESET	
	SETTING	PLAY LIST			
	SELECT				
MULTI PAD	SELECT	DIGITAL RECORDING	MULTIPAD CREATOR	RECORD	
	STOP				
	1	MULTIPAD SELECTION display		MULTIPAD EDIT	MULTIPAD 1
	2				MULTIPAD 2
	3				MULTIPAD 3
	4				MULTIPAD 4
DEMO		FUNCTION	UTILITY	OWNER	LANGUAGE SETTING
MENU	FUNCTION	FUNCTON	MIDI TEMPLETE SETTING		
	VOICE CREATOR		MASTER TUNE/SCALE TUNE	MASTER TUNE	
	DIGITAL RECORDING		MASTER TUNE/SCALE TUNE	SCALE TUNE	
MIXING CONSOLE		MIXING CONSOLE		VOL/VOICE (PANEL)	VOICE
BALANCE		BALANCE		PAGE2/2	
CHANNEL ON/OFF		CHANNEL		STYLE SETTING	
INTERNET		FUNCTION	UTILITY	OWNER	LANGUAGE SETTING
EXIT		MAIN			

Operation: [DIRECT ACCESS] button + button/controller listed below		**Function of the accessed LCD display**			
PART SELECT	LEFT	FUNCTION	REGIST SEQUENCE/FREEZE/ VOICE SET	VOICE SET	LEFT
	RIGHT1				RIGHT1
	RIGHT2				RIGHT2
	RIGHT3				RIGHT3
PART ON/OFF	LEFT	FUNCTION	STYLE SETTING/SPLIT POINT/ CHORD FINGERING	SPLIT POINT	SPLIT POINT (LEFT) SETTING
	RIGHT1				SPLIT POINT (RIGHT3) SETTING
	RIGHT2				
	RIGHT3				
	LEFT HOLD				SPLIT POINT (LEFT) SETTING
VOICE EFFECT	HARMONY ECHO	FUNCTION	HARMONY/ECHO		HARMONY ECHO SETTING
	INITIAL TOUCH		CONTROLLER	KEYBOARD/PANEL	INITIAL TOUCH
	SUSTAIN				AFTER TOUCH
	MONO	MIXING CONSOLE		TUNE	PORTAMENTO TIME SETTING
	DSP			EFFECT (PANEL)	DSP DEPTH SETTING
	VARIATION			EFFECT	EFFECT TYPE
VOICE	PIANO	MIXING CONSOLE		VOL/VOICE (PANEL)	VOICE
	E. PIANO				PANPOD
	ORGAN				VOLUME
	STRINGS			FILTER (PANEL)	HARMONIC CONTENT
	CHOIR				BRIGHTNESS
	BRASS			TUNE	PORTAMENTO TIME
	TRUMPET				PITCH BEND RANGE
	SAXOPHONE				OCTAVE
	FLUTE/CLARINET				TUNING
	GUITAR			EFFECT (PANEL)	REVERB
	BASS				CHORUS
	PERC./DRUM KIT				DSP
	ACCORDION			EQ (PANEL)	EQ HIGH
	PAD				EQ LOW
	SYNTH			MASTER COMPRESSOR	
	ORGAN FLUTES	FUNCTION	UTILITY	CONFIG 2	POPUP DISPLAY TIME
	EXPANSION			OWNER	LICENSE KEY
	USER DRIVE			SYSTEM RESET	
ART. 1		FUNCTION	CONTROLLER	FOOT PEDAL	PEDAL 1
ART. 2					PEDAL 2
MUSIC FINDER		MUSIC FINDER			MUSIC FINDER SEARCH 1
ONE TOUCH SETTING	1	OTS INFORMATION			
	2				
	3				
	4				
MIC	VH TYPE SELECT	VOCAL HARMONY		VOCAL HARMONY EDIT (OVERVIEW)	
	MIC SETTING	MIC SETTING		MIC SETTING MEMORY	
	VOCAL HARMONY	VOCAL HARMONY		VOCAL HARMONY EDIT (PART)/(DETAIL)	
	EFFECT	VOCAL HARMONY		VOCAL HARMONY EDIT (OVERVIEW)	
	TALK	MIC SETTING		TALK	
REGISTRATION MEMORY	REGIST BANK +	REGIST BANK SELECTION display	REGISTRATION EDIT		REGISTRATION
	REGIST BANK -				
	FREEZE	FUNCTION	REGIST SEQUENCE/FREEZE/ VOICE SET	FREEZE	
	MEMORY			REGISTRATION SEQUENCE	
	1	REGIST INFORMATION			REGIST INFORMATION 1–4
	2				
	3				
	4				
	5				REGIST INFORMATION 5–8
	6				
	7				
	8				
PEDAL	PEDAL 1	FUNCTION	CONTROLLER	FOOT PEDAL	PEDAL 1
	PEDAL 2				PEDAL 2
	PEDAL 3				PEDAL 3
WHEEL	MODULATION	FUNCTION	CONTROLLER	KEYBOARD/PANEL	MODULATION WHEEL
	PITCH BEND	MIXING CONSOLE		TUNE	PITCH BEND RANGE
SLIDER	ASSIGN	FUNCTION	CONTROLLER	ASSIGN SLIDER	
	1				
	2				
	3				
	4				
	5				
	6				
	7				
	8				



Chord Name [Abbreviation]	Normal Voicing	Display for root "C"
1+8	1+8	C1+8
1+5	1+5	C1+5
Major [M]	1+3+5	C
Sixth [6]	1+(3)+5+6	C6
Major seventh [M7]	1+3+(5)+7	CM7
Major seventh flatted fifth [M7♭5]	1+3+♭5+7	CM7(♭5)
Major seventh add sharp eleventh [M7(♯11)]	1+(2)+3+♯4+5+7	CM7(♯11)
Add ninth [(9)]	1+2+3+5	Cadd9
Major seventh ninth [M7_9]	1+2+3+(5)+7	CM7(9)
Sixth ninth [6_9]	1+2+3+(5)+6	C6(9)
Flatted fifth [(♭5)]	1+3+♭5	C♭5
Augmented [aug]	1+3+♯5	Caug
Seventh augmented [7aug]	1+3+♯5+♭7	C7aug
Major seventh augmented [M7aug]	1+(3)+♯5+7	CM7aug
Minor [m]	1+♭3+5	Cm
Minor sixth [m6]	1+♭3+5+6	Cm6
Minor seventh [m7]	1+♭3+(5)+♭7	Cm7
Minor seventh flatted fifth [m7♭5]	1+♭3+♭5+♭7	Cm7(♭5)
Minor add ninth [m(9)]	1+2+♭3+5	Cm add9
Minor seventh ninth [m7(9)]	1+2+♭3+(5)+♭7	Cm7(9)
Minor seventh eleventh [m7(11)]	1+(2)+♭3+4+5+(♭7)	Cm7(11)
Minor major seventh flatted fifth [mM7♭5]	1+♭3+♭5+7	CmM7(♭5)
Minor major seventh [mM7]	1+♭3+(5)+7	CmM7
Minor major seventh ninth [mM7(9)]	1+2+♭3+(5)+7	CmM7(9)
Diminished [dim]	1+♭3+♭5	Cdim
Diminished seventh [dim7]	1+♭3+♭5+6	Cdim7
Seventh [7]	1+3+(5)+♭7	C7
Seventh suspended fourth [7sus4]	1+4+5+♭7	C7sus4
Seventh ninth [7(9)]	1+2+3+(5)+♭7	C7(9)
Seventh add sharp eleventh [7(♯11)]	1+(2)+3+♯4+5+♭7	C7(♯11)
Seventh add thirteenth [7(13)]	1+3+(5)+6+♭7	C7(13)
Seventh flatted fifth [7♭5]	1+3+♭5+♭7	C7(♭5)
Seventh flatted ninth [7(♭9)]	1+♭2+3+(5)+♭7	C7(♭9)
Seventh add flatted thirteenth [7(♭13)]	1+3+5+♭6+♭7	C7(♭13)
Seventh sharp ninth [7(♯9)]	1+♯2+3+(5)+♭7	C7(♯9)
Suspended fourth [sus4]	1+4+5	Csus4
One plus two plus five [sus2]	1+2+5	Csus2
cancel	1+♭2+2	Cancel

* Notes in parentheses can be omitted.

Reverb Block

Type	Description	MSB	LSB
BASIC HALL	Reverb simulating the acoustics of a hall. Standard setting.	1	21
LIGHT HALL	Reverb simulating the acoustics of a hall. Light setting.	1	22
BALLAD HALL	Reverb simulating the acoustics of a hall. For ballad type music.	1	19
PIANO HALL	Reverb simulating the acoustics of a hall. For piano sound.	1	20
HALL1	Reverb simulating the acoustics of a hall.	1	0
HALL2		1	16
HALL3		1	17
HALL4		1	18
HALL5		1	1
HALL M		1	6
HALL L		1	7
ATMO HALL	A unique long reverb with atmosphere.	1	23
VOCAL HALL1	Reverb suitable for vocals.	1	27
VOCAL HALL2		1	28
ACOSTIC ROOM (Acoustic Room)	Reverb simulating the acoustics of a room. Standard setting.	2	20
DRUMS ROOM	Reverb simulating the acoustics of a room. For drum sounds.	2	21
PERC ROOM (Percussion Room)	Reverb simulating the acoustics of a room. For percussion sounds.	2	22
ROOM1	Reverb simulating the acoustics of a room.	2	16
ROOM2		2	17
ROOM3		2	18
ROOM4		2	19
ROOM5		2	0
ROOM6		2	1
ROOM7		2	2
ROOM S		2	5
ROOM M		2	6
ROOM L		2	7
STAGE1	Reverb suitable for a solo instrument.	3	16
STAGE2		3	17
STAGE3		3	0
STAGE4		3	1
PLATE1	Reverb simulating a plate reverb unit.	4	16
PLATE2		4	17
PLATE3		4	0
GM PLATE		4	7
TUNNEL	Simulates a cylindrical space expanding to left and right.	17	0
CANYON	A hypothetical acoustic space which extends without limit.	18	0
BASEMENT	A bit of initial delay followed by reverb with a unique resonance.	19	0
LARGE HALL	Reverb simulating the acoustics of a hall.	1	2
MEDIUM HALL		1	3
WARM ROOM	Reverb simulating the acoustics of a warm room.	2	3
WHITE ROOM	A unique short reverb with a bit of initial delay.	16	0
WOODY ROOM	Reverb simulating the acoustics of a wood-built room.	2	4
RICH PLATE	Reverb simulating a rich plate reverb unit.	4	1
NO EFFECT	No effect.	0	0

Chorus Block

Category	Type	Description	MSB	LSB
REVERB	HALL1	Reverb simulating the acoustics of a hall.	1	0
	HALL2		1	16
	HALL3		1	17
	HALL4		1	18
	HALL5		1	1
	HALL M		1	6
	HALL L		1	7
	ATMO HALL	A unique long reverb with atmosphere.	1	23
	ACOSTIC ROOM (Acoustic Room)	Reverb simulating the acoustics of a room. Standard setting.	2	20
	DRUMS ROOM	Reverb simulating the acoustics of a room. For drum sounds.	2	21
	PERC ROOM (Percussion Room)	Reverb simulating the acoustics of a room. For percussion sounds.	2	22
	ROOM1	Reverb simulating the acoustics of a room.	2	16
	ROOM2		2	17
	ROOM3		2	18
	ROOM4		2	19
	ROOM5		2	0
	ROOM6		2	1
	ROOM7		2	2
	ROOM S		2	5
	ROOM M		2	6
	ROOM L		2	7
	STAGE1	Reverb suitable for a solo instrument.	3	16
	STAGE2		3	17
	STAGE3		3	0
	STAGE4		3	1
	PLATE1	Reverb simulating a plate reverb unit.	4	16
	PLATE2		4	17
	PLATE3		4	0
	GM PLATE		4	7

Category	Type	Description	MSB	LSB
DELAY	TEMPO DELAY1	Tempo-synchronized delay.	21	0
	TEMPO DELAY2		21	16
	TEMPO ECHO	Tempo-synchronized echo.	21	8
	TEMPO CROSS1	Tempo-synchronized cross delay.	22	0
	TEMPO CROSS2		22	16
	TEMPO CROSS3		22	17
	TEMPO CROSS4		22	18
ER/KARAOKE	KARAOKE1	Echo for karaoke.	20	0
	KARAOKE2		20	1
	KARAOKE3		20	2
	ER1	This effect isolates only the early reflection components of the reverb.	9	0
	ER2		9	1
CHORUS	CHORUS1	Conventional chorus program with rich, warm chorusing.	66	17
	CHORUS2		66	8
	CHORUS3		66	16
	CHORUS4		66	1
	CHORUS5		65	2
	CHORUS6		65	0
	CHORUS7		65	1
	CHORUS8		65	8
	CHORUS FAST		65	16
	CHORUS LITE		65	17
	GM CHORUS1		65	3
	GM CHORUS2		65	4
	GM CHORUS3		65	5
	GM CHORUS4		65	6
	FB CHORUS		65	7
	CELESTE1	A 3-phase LFO adds modulation and spaciousness to the sound.	66	0
	CELESTE2		66	2
	SYMPHONIC1	Adds more stages to the modulation of Celeste.	68	16
	SYMPHONIC2		68	0
	ENS DETUNE1 (Ensemble Detune 1)	Chorus effect without modulation, created by adding a slightly pitch-shifted sound.	87	0
	ENS DETUNE2 (Ensemble Detune 2)		87	16
FLANGER	FLANGER1	Creates a sound similar to that of a jet airplane.	67	8
	FLANGER2		67	16
	FLANGER3		67	17
	FLANGER4		67	1
	FLANGER5		67	0
	GM FLANGER		67	7
	T_FLANGER (Tempo Flanger)	Tempo-synchronized flanger.	107	0
PHASER	PHASER1	Cyclically modulates the phase to add modulation to the sound.	72	0
	PHASER2		72	8
	PHASER3		72	19
	T_PHASER1 (Tempo Phaser 1)	Tempo-synchronized phaser.	108	0
	T_PHASER2 (Tempo Phaser 2)		108	16
	EP PHASER1	Cyclically modulates the phase to add modulation to the sound.	72	17
	EP PHASER2		72	18
	EP PHASER3		72	16
PITCH CHANGE	PITCH CHG1 (Pitch Change 1)	Changes the pitch of the input signal.	80	16
	PITCH CHG2 (Pitch Change 2)		80	0
	PITCH CHG3 (Pitch Change 3)		80	1
ROTARY SP	DUAL ROT BRT (Dual Rotor Speaker Bright)	Simulates a rotary speaker.	99	16
	DUAL ROT WRM (Dual Rotor Speaker Warm)		99	17
	DUAL ROT SP1 (Dual Rotor Speaker 1)		99	0
	DUAL ROT SP2 (Dual Rotor Speaker 2)		99	1
	ROTARY SP1 (Rotary Speaker 1)		69	16
	ROTARY SP2 (Rotary Speaker 2)		71	17
	ROTARY SP3 (Rotary Speaker 3)		71	18
	ROTARY SP4 (Rotary Speaker 4)		70	17
	ROTARY SP5 (Rotary Speaker 5)		66	18
	ROTARY SP6 (Rotary Speaker 6)		69	0
	ROTARY SP7 (Rotary Speaker 7)		71	22
	2WAY ROT SP (2 way Rotary Speaker)		86	0
TREMOLO	TREMOLO1	Rich Tremolo effect with both volume and pitch modulation.	70	16
	TREMOLO2		71	19
	TREMOLO3		70	0
	EP TREMOLO		70	18
	GT TREMOLO1 (Guitar Tremolo 1)		71	20
	GT TREMOLO2 (Guitar Tremolo 2)		70	19
	VIBE VIBRATE	Vibraphone effect.	119	0
	T_TREMOLO (Tempo Tremolo)	Tempo-synchronized rich Tremolo effect with both volume and pitch modulation.	120	0
SPATIAL	AUTO PAN1	Several panning effects that automatically shift the sound position (left, right, front, back).	71	16
	AUTO PAN2		71	0
	AUTO PAN3		71	1
	EP AUTOPAN		71	21
	T_AUTO PAN1 (Tempo Auto Pan 1)	Tempo-synchronized auto pan.	121	0
	T_AUTO PAN2 (Tempo Auto Pan 2)		121	1
NO EFFECT	–	No effect.	0	0

DSP1-9 Block

LCD Block Name	XG Block Name
DSP1	XG Variation Block
DSP2	XG Insertion1 Block
DSP3	XG Insertion2 Block
DSP4	XG Insertion3 Block
DSP5	XG Insertion4 Block
DSP6	XG Insertion5 Block
DSP7	XG Insertion6 Block (only for MIC & Song)
DSP8	XG Insertion7 Block (only for Style)
DSP9	XG Insertion8 Block (only for Style)

Category	Type	Description	MSB	LSB
REVERB	HALL1	Reverb simulating the acoustics of a hall.	1	0
	HALL2		1	16
	HALL3		1	17
	HALL4		1	18
	HALL5		1	1
	HALL M		1	6
	HALL L		1	7
	ATMO HALL	A unique long reverb with atmosphere.	1	23
	ACOSTIC ROOM (Acoustic Room)	Reverb simulating the acoustics of a room. Standard setting.	2	20
	DRUMS ROOM	Reverb simulating the acoustics of a room. For drum sounds.	2	21
	PERC ROOM (Percussion Room)	Reverb simulating the acoustics of a room. For percussion sounds.	2	22
	ROOM1	Reverb simulating the acoustics of a room.	2	16
	ROOM2		2	17
	ROOM3		2	18
	ROOM4		2	19
	ROOM5		2	0
	ROOM6		2	1
	ROOM7		2	2
	ROOM S		2	5
	ROOM M		2	6
	ROOM L		2	7
	STAGE1	Reverb suitable for a solo instrument.	3	16
	STAGE2		3	17
	STAGE3		3	0
	STAGE4		3	1
	PLATE1	Reverb simulating a plate reverb unit.	4	16
	PLATE2		4	17
	PLATE3		4	0
	GM PLATE		4	7
	TUNNEL	Simulates a cylindrical space expanding to left and right.	17	0
	CANYON	A hypothetical acoustic space which extends without limit.	18	0
	BASEMENT	A bit of initial delay followed by reverb with a unique resonance.	19	0
	WHITE ROOM	A unique short reverb with a bit of initial delay.	16	0
DELAY	DELAY LCR1	Produces three delayed sounds: L, R and C (center).	5	16
	DELAY LCR2		5	0
	DELAY LR	Produces two delayed sounds: L and R. Two feedback delays are provided.	6	0
	ECHO	Two delayed sounds (L and R), and independent feedback delays for L and R.	7	0
	CROSS DELAY1	The feedback of the two delayed sounds is crossed.	8	0
	CROSS DELAY2		8	16
	TEMPO DELAY1	Tempo-synchronized delay.	21	0
	TEMPO DELAY2		21	16
	TEMPO ECHO	Tempo-synchronized echo.	21	8
	TEMPO CROSS1	Tempo-synchronized cross delay.	22	0
	TEMPO CROSS2		22	16
	TEMPO CROSS3		22	17
	TEMPO CROSS4		22	18
ER/KARAOKE	KARAOKE1	Echo for karaoke.	20	0
	KARAOKE2		20	1
	KARAOKE3		20	2
	ER1	This effect isolates only the early reflection components of the reverb.	9	0
	ER2		9	1
	GATE REVERB 1	Simulation of gated reverb.	10	0
	GATE REVERB 2		10	16
	REVERS GATE	Simulation of gated reverb played back in reverse.	11	0
CHORUS	CHORUS1	Conventional chorus program with rich, warm chorusing.	66	17
	CHORUS2		66	8
	CHORUS3		66	16
	CHORUS4		66	1
	CHORUS5		65	2
	CHORUS6		65	0
	CHORUS7		65	1
	CHORUS8		65	8
	CHORUS FAST		65	16
	CHORUS LITE		65	17
	GM CHORUS1		65	3
	GM CHORUS2		65	4
	GM CHORUS3		65	5
	GM CHORUS4		65	6
	FB CHORUS		65	7

Category	Type	Description	MSB	LSB
CHORUS	CELESTE1	A 3-phase LFO adds modulation and spaciousness to the sound.	66	0
	CELESTE2		66	2
	SYMPHONIC1	Adds more stages to the modulation of Celeste.	68	16
	SYMPHONIC2		68	0
	ENS DETUNE1 (Ensemble Detune 1)	Chorus effect without modulation, created by adding a slightly pitch-shifted sound.	87	0
	ENS DETUNE2 (Ensemble Detune 2)		87	16
FLANGER	FLANGER1	Creates a sound similar to that of a jet airplane.	67	8
	FLANGER2		67	16
	FLANGER3		67	17
	FLANGER4		67	1
	FLANGER5		67	0
	GM FLANGER		67	7
	VIN.FLANGER1	This simulates an analog flanger, giving a strong vintage flavor to the sound.	124	1
	VIN.FLANGER2		124	16
	V_FLANGER	A simulation of an analog flanger effect. The LFO has a random setting.	104	0
	T_FLANGER (Tempo Flanger)	Tempo-synchronized flanger.	107	0
	DYN FLANGER	Dynamically controlled flanger.	110	0
PHASER	PHASER1	Cyclically modulates the phase to add modulation to the sound.	72	0
	PHASER2		72	8
	PHASER3		72	19
	V.PHASER1	This simulates an analog phaser, giving a strong vintage flavor to the sound. It is effective in mono.	124	2
	V.PHASER2		124	17
	V.PHASER ST1	This simulates an analog phaser, giving a strong vintage flavor to the sound. It is effective in stereo.	124	3
	V.PHASER ST2		124	18
	V.PHASER ST3		124	19
	V.PHASER ST4		124	20
	T_PHASER1 (Tempo Phaser 1)	Tempo-synchronized phaser.	108	0
	T_PHASER2 (Tempo Phaser 2)		108	16
	EP PHASER1	Cyclically modulates the phase to add modulation to the sound. For electric piano.	72	17
	EP PHASER2		72	18
	EP PHASER3		72	16
	DYN PHASER	Dynamically controlled phaser.	111	0
DISTORTION	V_DIST WARM (V Distortion Warm)	Distortion which simulates the sound of a vintage tube, fuzz effect, etc.	98	22
	V_DIST CLS H (V Distortion Classic Hard)		98	23
	V_DIST CLS S (V Distortion Classic Soft)		98	20
	V_DIST METAL (V Distortion Metal)		98	24
	V_DIST CRUNC (V Distortion Crunch)		98	18
	V_DIST BLUES (V Distortion Blues)		98	21
	V_DIST EDGY (V Distortion Edgy)		98	19
	V_DIST SOLID (V Distortion Solid)		98	25
	V_DST CLEAN1 (V Distortion Clean 1)		98	17
	V_DST CLEAN2 (V Distortion Clean 2)		98	26
	V_DIST TWIN (V Distortion Twin)		98	16
	V_DIST ROCA (V Distortion Rockabilly)		103	18
	V_DST JZ CLN (V Distortion Jazz Clean)		98	27
	V_DST FUSION (V Distortion Fusion)		103	19
	ST AMP SOLID (Stereo Amp Simulator Solid)	Stereo amp simulator.	75	29
	ST AMP CRUNC (Stereo Amp Simulator Crunch)		75	30
	ST AMP BLUES (Stereo Amp Simulator Blues)		75	28
	ST AMP CLEAN (Stereo Amp Simulator Clean)		75	27
	ST AMP HARP (Stereo Amp Simulator Blues Harp)		75	31
	V_DIST HARD (V Distortion Hard)	Distortion which simulates the sound of a vintage tube, fuzz effect, etc.	98	0
	V_DIST SOFT (V Distortion Soft)		98	2
	DIST HARD1 (Distortion Hard 1)	Hard-edge distortion.	75	16
	DIST HARD2 (Distortion Hard 2)		75	22
	DIST SOFT1 (Distortion Soft 1)	Soft, warm distortion.	75	17
	DIST SOFT2 (Distortion Soft 2)		75	23
	DIST HEAVY (Distortion Heavy)	Heavy distortion.	73	0
	OVERDRIVE	Adds mild distortion to the sound.	74	0
	ST DIST (Stereo Distortion)	Stereo distortion.	73	8
	ST OD (Stereo Overdrive)	Stereo overdrive.	74	8
	ST DIST HARD (Stereo Distortion Hard)	Hard-edge stereo distortion.	75	18
	ST DIST SOFT (Stereo Distortion Soft)	Soft, warm soft distortion.	75	19
	AMP SIM1 (Amp Simulator 1)	A simulation of a guitar amp.	75	0
	AMP SIM2 (Amp Simulator 2)		75	1
	ST AMP1 (Stereo Amp Simulator 1)	Stereo amp simulator.	75	20
	ST AMP2 (Stereo Amp Simulator 2)		75	21
	ST AMP3 (Stereo Amp Simulator 3)		75	8
	ST AMP4 (Stereo Amp Simulator 4)		75	24
	ST AMP5 (Stereo Amp Simulator 5)		75	25
	ST AMP6 (Stereo Amp Simulator 6)		75	26
DISTORTION+ (Distortion/ Overdrive mixed with other effects)	DST+DELAY1 (Distortion + Delay 1)	Distortion and Delay are connected in series.	95	16
	DST+DELAY2 (Distortion + Delay 2)		95	0
	OD+DELAY1 (Overdrive + Delay 1)	Overdrive and Delay are connected in series.	95	17
	OD+DELAY2 (Overdrive + Delay 2)		95	1
	CMP+DST+DLY1 (Compressor + Distortion + Delay 1)	Compressor, Distortion and Delay are connected in series.	96	16
	CMP+DST+DLY2 (Compressor + Distortion + Delay 2)		96	0
	CMP+OD+DLY1 (Compressor + Overdrive + Delay 1)	Compressor, Overdrive and Delay are connected in series.	96	17
	CMP+OD+DLY2 (Compressor + Overdrive + Delay 2)		96	1
	V_DST H+DLY (V Distortion Hard + Delay)	V Distortion Hard and Delay are connected in series.	98	1
	V_DST S+DLY (V Distortion Soft + Delay)	V Distortion Soft and Delay are connected in series.	98	3
	DST+TDLY (Distortion + Tempo Delay)	Distortion and Tempo Delay are connected in series.	100	0
	OD+TDLY (Overdrive + Tempo Delay)	Overdrive and Tempo Delay are connected in series.	100	1

Category	Type	Description	MSB	LSB
DISTORTION+ (Distortion/ Overdrive mixed with other effects)	COMP+DIST1 (Compressor + Distortion 1)	Since a Compressor is included in the first stage, steady distortion can be produced regardless of changes in input level.	73	16
	COMP+DIST2 (Compressor + Distortion 2)		73	1
	CMP+DST+TDL (Compressor + Distortion + Tempo Delay)	Compressor, Distortion and Tempo Delay are connected in series.	101	0
	CMP+OD+TDLY1 (Compressor + Overdrive + Tempo Delay 1)		101	1
	CMP+OD+TDLY2 (Compressor + Overdrive + Tempo Delay 2)		101	16
	CMP+OD+TDLY3 (Compressor + Overdrive + Tempo Delay 3)		101	17
	CMP+OD+TDLY4 (Compressor + Overdrive + Tempo Delay 4)		101	18
	CMP+OD+TDLY5 (Compressor + Overdrive + Tempo Delay 5)		101	19
	CMP+OD+TDLY6 (Compressor + Overdrive + Tempo Delay 6)		101	20
	V_DST H+TDL1 (V Distortion Hard + Tempo Delay 1)	V Distortion Hard and Tempo Delay are connected in series.	103	0
	V_DST H+TDL2 (V Distortion Hard + Tempo Delay 2)		103	17
	V_DST S+TDL1 (V Distortion Soft + Tempo Delay 1)	V Distortion Soft and Tempo Delay are connected in series.	103	1
	V_DST S+TDL2 (V Distortion Soft + Tempo Delay 2)		103	16
PITCH CHANGE	PITCH CHG1 (Pitch Change 1)	Changes the pitch of the input signal.	80	16
	PITCH CHG2 (Pitch Change 2)		80	0
	PITCH CHG3 (Pitch Change 3)		80	1
WAH AUTO	AUTO WAH1	Cyclically modulates the center frequency of a wah filter.	78	16
	AUTO WAH2		78	0
	V.AUTO WAH	This simulates an analog wah pedal effect, giving a strong vintage flavor to the sound. It cyclically changes the central frequency of the wah filter.	124	5
	AT.WAH+DST1 (Auto Wah + Distortion 1)	Distortion can be applied to the output of Auto Wah.	78	17
	AT.WAH+DST2 (Auto Wah + Distortion 2)		78	1
	AT.WH+DST HD (Auto Wah + Distortion Hard)		78	21
	AT.WH+DST HV (Auto Wah + Distortion Heavy)		78	23
	AT.WH+DST LT (Auto Wah + Distortion Lite)		78	25
	AT.WAH+OD1 (Auto Wah + Overdrive 1)	Overdrive distortion can be applied to the output of Auto Wah.	78	18
	AT.WAH+OD2 (Auto Wah + Overdrive 2)		78	2
	AT.WH+OD HD (Auto Wah + Overdrive Hard)		78	22
	AT.WH+OD HV (Auto Wah + Overdrive Heavy)		78	24
	AT.WH+OD LT (Auto Wah + Overdrive Lite)		78	26
	TEMPO AT.WAH (Tempo Auto Wah)	Tempo-synchronized Auto Wah.	79	0
	T_AT.WH+DST (Tempo Auto Wah + Distortion)	Tempo-synchronized Auto Wah. Distortion can be applied to the output.	79	1
	T_A.WH+DSTHD (Tempo Auto Wah + Distortion Hard)		79	21
	T_A.WH+DSTHV (Tempo Auto Wah + Distortion Heavy)		79	23
	T_A.WH+DSTLT (Tempo Auto Wah + Distortion Lite)		79	25
	T_AT.WH+OD (Tempo Auto Wah + Overdrive)	Tempo-synchronized Auto Wah. Overdrive distortion can be applied to the output.	79	2
	T_A.WH+OD HD (Tempo Auto Wah + Overdrive Hard)		79	22
	T_A.WH+OD HV (Tempo Auto Wah + Overdrive Heavy)		79	24
	T_A.WH+OD LT (Tempo Auto Wah + Overdrive Lite)		79	26
WAH TCH/PDL (Touch Wah/ Pedal Wah)	TOUCH WAH1	Changes the center frequency of a wah filter according to the input level.	82	0
	TOUCH WAH2		82	8
	TOUCH WAH3		82	20
	V.TOUCH WAH	This simulates an analog wah pedal effect, giving a strong vintage flavor to the sound. It changes the central frequency of the wah filter according to the input level.	125	2
	TC.WH+DST1 (Touch Wah + Distortion 1)	Distortion can be applied to the output of Touch Wah.	82	16
	TC.WH+DST2 (Touch Wah + Distortion 2)		82	1
	TC.WH+DST HD (Touch Wah + Distortion Hard)		82	21
	TC.WH+DST HV (Touch Wah + Distortion Heavy)		82	23
	TC.WH+DST LT (Touch Wah + Distortion Lite)		82	25
	TC.WAH+OD1 (Touch Wah + Overdrive 1)	Overdrive distortion can be applied to the output of Touch Wah.	82	17
	TC.WAH+OD2 (Touch Wah + Overdrive 2)		82	2
	TC.WAH+OD HD (Touch Wah + Overdrive Hard)		82	22
	TC.WAH+OD HV (Touch Wah + Overdrive Heavy)		82	24
	TC.WAH+OD LT (Touch Wah + Overdrive Lite)		82	26
	WH+DST+DLY1 (Wah + Distortion + Delay 1)	Wah, Distortion and Delay are connected in series.	97	16
	WH+DST+DLY2 (Wah + Distortion + Delay 2)		97	0
	WH+DST+TDLY (Wah + Distortion + Tempo Delay)	Wah, Distortion and Tempo Delay are connected in series.	102	0
	WH+OD+DLY1 (Wah + Overdrive + Delay 1)	Wah, Overdrive and Delay are connected in series.	97	17
	WH+OD+DLY2 (Wah + Overdrive + Delay 2)		97	1
	WH+OD+TDLY1 (Wah + Overdrive + Tempo Delay 1)	Wah, Overdrive and Tempo Delay are connected in series.	102	1
	WH+OD+TDLY2 (Wah + Overdrive + Tempo Delay 2)		102	16
	CLAVI TC.WAH (Clavi Touch Wah)	Clavinet Touch Wah	82	18
	EP TC.WAH (EP Touch Wah)	EP Touch Wah	82	19
	V.PEDAL WH B (Vintage Pedal Wah Basic)	Vintage Wah which can be controlled by "Pedal Control" parameter. (See Effect Parameter List.)	125	1
	V.PEDAL WH D (Vintage Pedal Wah Disco)		125	16
	PEDAL WAH (Pedal Wah)	Changes the center frequency of a wah filter according to "Pedal Control" parameter. (See Effect Parameter List.)	122	0
	PEDAL WH+DST (Pedal Wah + Distortion)	Distortion can be applied to the output of Pedal Wah.	122	1
	P.WH+DIST HD (Pedal Wah + Distortion Hard)		122	21
	P.WH+DIST HV (Pedal Wah + Distortion Heavy)		122	23
	P.WH+DIST LT (Pedal Wah + Distortion Lite)		122	25
	PEDAL WH+OD (Pedal Wah + Overdrive)	Overdrive distortion can be applied to the output of Pedal Wah.	122	2
	P.WH+OD HD (Pedal Wah + Overdrive Hard)		122	22
	P.WH+OD HV (Pedal Wah + Overdrive Heavy)		122	24
	P.WH+OD LT (Pedal Wah + Overdrive Lite)		122	26
DYNAMIC	COMP MED (Compressor Medium)	Compressor with medium setting.	83	16
	COMP HEAVY (Compressor Heavy)	Compressor with heavy setting.	83	17
	COMP MELODY (Compressor Melody)	Compressor for the Melody part.	105	16
	COMP BASS (Compressor Bass)	Compressor for the Bass part.	105	17
	V.COMPRESSOR	This simulates an analog compressor, giving a vintage flavor to the sound.	124	4
	MBAND COMP	Multi-band compressor that allows you to adjust the compression effect for individual frequency bands.	105	0
	COMPRESSOR	Holds down the output level when a specified input level is exceeded. A sense of attack can also be added to the sound.	83	0
	NOISE GATE	Gates the input when the input signal falls below a specified level.	84	0

Category	Type	Description	MSB	LSB
ROTARY SP	DUAL ROT BRT (Dual Rotor Speaker Bright)	Simulates a rotary speaker.	99	16
	DUAL ROT WRM (Dual Rotor Speaker Warm)		99	17
ROTARY SP	DUAL ROT SP1 (Dual Rotor Speaker 1)	Simulates a rotary speaker.	99	0
	DUAL ROT SP2 (Dual Rotor Speaker 2)		99	1
	ROTARY SP1 (Rotary Speaker 1)		69	16
	ROTARY SP2 (Rotary Speaker 2)		71	17
	ROTARY SP3 (Rotary Speaker 3)		71	18
	ROTARY SP4 (Rotary Speaker 4)		70	17
	ROTARY SP5 (Rotary Speaker 5)		66	18
	ROTARY SP6 (Rotary Speaker 6)		69	0
	ROTARY SP7 (Rotary Speaker 7)		71	22
	2WAY ROT SP (2-way Rotary Speaker)		86	0
	DST+ROT SP (Distortion + Rotary Speaker)	Distortion and rotary speaker connected in series.	69	1
	DST+2ROT SP (Distortion + 2-way Rotary Speaker)	Distortion and 2-way rotary speaker connected in series.	86	1
	OD+ROT SP (Overdrive + Rotary Speaker)	Overdrive and rotary speaker connected in series.	69	2
	OD+2ROT SP (Overdrive + 2-way Rotary Speaker)	Overdrive and 2-way rotary speaker connected in series.	86	2
	AMP+ROT SP (Amp Simulator + Rotary Speaker)	Amp simulator and rotary speaker connected in series.	69	3
	AMP+2ROT SP (Amp Simulator + 2-way Rotary Speaker)	Amp simulator and 2-way rotary speaker connected in series.	86	3
TREMOLO	TREMOLO1	Rich Tremolo effect with both volume and pitch modulation.	70	16
	TREMOLO2		71	19
	TREMOLO3		70	0
	EP TREMOLO		70	18
	GT TREMOLO1 (Guitar Tremolo 1)		71	20
	GT TREMOLO2 (Guitar Tremolo 2)		70	19
	VIBE VIBRATE	Vibraphone effect	119	0
	T_TREMOLO (Tempo Tremolo)	Tempo-synchronized Tremolo.	120	0
SPATIAL	AUTO PAN1	Several panning effects that automatically shift the sound position (left, right, front, back).	71	16
	AUTO PAN2		71	0
	AUTO PAN3		71	1
	EP AUTO PAN		71	21
	T_AUTO PAN1 (Tempo Auto Pan 1)	Tempo-synchronized auto pan.	121	0
	T_AUTO PAN2 (Tempo Auto Pan 2)		121	1
EQ/ENHANCER	EQ DISCO	Equalizer effect that boosts both high and low frequencies, as is typical in most disco music.	76	16
	EQ TEL	Equalizer effect that cuts both high and low frequencies, to simulate the sound heard through a telephone receiver.	76	17
	2BAND EQ	A stereo EQ with adjustable LOW and HIGH. Ideal for drum Parts.	77	0
	3BAND EQ	A mono EQ with adjustable LOW, MID, and HIGH equalization.	76	0
	ST 3BAND EQ	A stereo EQ with adjustable LOW, MID, and HIGH equalization.	76	18
	HM ENHANCE1 (Harmonic Enhancer 1)	Adds new harmonics to the input signal to make the sound stand out.	81	16
	HM ENHANCE2 (Harmonic Enhancer 2)		81	0
MISC	VCE CANCEL (Voice Cancel)	Attenuates the vocal part of a CD or other source.	85	0
	AMBIENCE	Blurs the stereo positioning of the sound to add spatial width.	88	0
	TALKING MOD (Talking Modulation)	Adds a vowel sound to the input signal.	93	0
	LOOP FX1	Degrades the audio quality of the input signal.	94	16
	LOOP FX2		94	17
	LO-FI		94	0
	LO-FI DRUM1	Degrades the audio quality of the input signal. Ideal for drum sounds.	94	18
	LO-FI DRUM2		94	19
	LO-FI DRUM3		76	19
	LO-FI DRUM4		76	20
	DYN FILTER	Dynamically controlled filter.	109	0
	DYN RINGMOD	Dynamically controlled Ring Modulator.	112	0
	RING MOD	An effect that modifies the pitch by applying amplitude modulation to the frequency of the input.	113	0
	ISOLATOR	Controls the level of a specified frequency band of the input signal.	115	0
NO EFFECT (*1)	–	No effect.	0	0
THRU	–	Bypass without applying an effect.	64	0

*1 DSP1 only

- Parameters marked with a ● in the “Control” column can be controlled from an AC1 (assignable controller 1) etc. However, these only affect insertion type effects.
- Parameter 10 Dry/Wet only affects insertion type effects.

(*1) Reverb Block
(*2) Chorus Block
(*3) DSP Block

REVERB

BASIC HALL, LIGHT HALL, HALL1,2,3,4,5, HALL M, HALL L, ATMO HALL, VOCAL HALL1,2, ACOSTIC ROOM, DRUMS ROOM, PERC ROOM, ROOM1,2,3,4,5,6,7, ROMM S, ROOM M, ROOM L, STAGE1,2,3,4, PLATE1,2,3, GM PLATE

No.	Parameter	Display	Value	See Table	Control
1	Reverb Time	0.3s – 30.0s	0 – 69	table#4	
2	Diffusion	0 – 10	0 – 10		
3	Initial Delay	0.1ms – 200.0ms (*1)	0 – 127	table#5	
		0.1ms – 99.3ms (*2,3)	0 – 63		
4	HPF Cutoff	Thru, 22Hz – 8.0kHz	0, 1 – 52	table#3	
5	LPF Cutoff	1.0kHz – 18kHz, Thru	34 – 59, 60	table#3	
6					
7					
8					
9					
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11	Rev Delay	0.1ms – 200.0ms (*1)	0 – 127	table#5	
		0.1ms – 99.3ms (*2,3)	0 – 63		
12	Density	0 – 4 (*1,2)	0 – 4		
		0 – 2 (*3)	0 – 2		
13	Er/Rev Balance	E63>R – E=R – E<R63	1 – 64 – 127		
14	High Damp	0.1 – 1.0	1 – 10		
15	Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
16					

BALLAD HALL, PIANO HALL, LARGE HALL, MEDIUM HALL WARM ROOM, WOODY ROOM, RICH PLATE

No.	Parameter	Display	Value	See Table	Control
1	Reverb Time	0.3s – 30.0s	0 – 69	table#4	
2	Diffusion	0 – 10	0 – 10		
3	Initial Delay	0.1ms – 200.0ms	0 – 127	table#5	
4	HPF Cutoff	Thru, 22Hz – 8.0kHz	0, 1 – 52	table#3	
5	LPF Cutoff	1.0kHz – 18kHz, Thru	34 – 59, 60	table#3	
6					
7					
8					
9					
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11					
12					
13					
14	High Damp	0.1 – 1.0	1 – 10		
15					
16					

TUNNEL, CANYON, BASEMENT, WHITE ROOM

No.	Parameter	Display	Value	See Table	Control
1	Reverb Time	0.3s – 30.0s	0 – 69	table#4	
2	Diffusion	0 – 10	0 – 10		
3	Initial Delay	0.1ms – 200.0ms (*1)	0 – 127	table#5	
		0.1ms – 99.3ms (*3)	0 – 63		
4	HPF Cutoff	Thru, 22Hz – 8.0kHz	0, 1 – 52	table#3	
5	LPF Cutoff	1.0kHz – 18kHz, Thru	34 – 59, 60	table#3	
6	Width	0.5m – 30.2m (*1)	0 – 104	table#11	
		0.5m – 10.2m (*3)	0 – 37		
7	Height	0.5m – 30.2m (*1)	0 – 104	table#11	
		0.5m – 20.2m (*3)	0 – 73		
8	Depth	0.5m – 30.2m	0 – 104	table#11	
9	Wall Vary	0 – 30	0 – 30		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11	Rev Delay	0.1ms – 200.0ms (*1)	0 – 127	table#5	
		0.1ms – 99.3ms (*3)	0 – 63		
12	Density	0 – 4	0 – 4		
13	Er/Rev Balance	E63>R – E=R – E<R63	1 – 64 – 127		
14	High Damp	0.1 – 1.0	1 – 10		
15	Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
16					

DELAY

DELAY LCR1, DELAY LCR2

No.	Parameter	Display	Value	See Table	Control
1	Lch Delay	0.1ms – 1638.3ms	1 – 16383		
2	Rch Delay	0.1ms – 1638.3ms	1 – 16383		
3	Cch Delay	0.1ms – 1638.3ms	1 – 16383		
4	Feedback Delay	0.1ms – 1638.3ms	1 – 16383		
5	Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
6	Cch Level	0 – 127	0 – 127	table#18	
7	High Damp	0.1 – 1.0	1 – 10		
8					
9					
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11					
12					
13	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
14	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
15	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
16	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		

DELAY LR

No.	Parameter	Display	Value	See Table	Control
1	Lch Delay	0.1ms – 1638.3ms	1 – 16383		
2	Rch Delay	0.1ms – 1638.3ms	1 – 16383		
3	Feedback Delay 1	0.1ms – 1638.3ms	1 – 16383		
4	Feedback Delay 2	0.1ms – 1638.3ms	1 – 16383		
5	Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
6	High Damp	0.1 – 1.0	1 – 10		
7					
8					
9					
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11					
12					
13	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
14	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
15	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
16	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		

ECHO

No.	Parameter	Display	Value	See Table	Control
1	Lch Delay1	0.1ms – 1486.0ms	1 – 14860		
2	Lch Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
3	Rch Delay1	0.1ms – 1486.0ms	1 – 14860		
4	Rch Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
5	High Damp	0.1 – 1.0	1 – 10		
6	Lch Delay2	0.1ms – 1486.0ms	1 – 14860		
7	Rch Delay2	0.1ms – 1486.0ms	1 – 14860		
8	Delay2 Level	0 – 127	0 – 127	table#18	
9					
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11					
12					
13	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
14	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
15	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
16	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		

CROSS DELAY1, CROSS DELAY2

No.	Parameter	Display	Value	See Table	Control
1	L->R Delay	0.1ms – 1486.0ms	1 – 14860		
2	R->L Delay	0.1ms – 1486.0ms	1 – 14860		
3	Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
4	Input Select	L, R, L&R	0 – 2		
5	High Damp	0.1 – 1.0	1 – 10		
6					
7					
8					
9					
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11					
12					
13	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
14	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
15	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
16	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		

TEMPO DELAY1, TEMPO DELAY2, TEMPO ECHO

No.	Parameter	Display	Value	See Table	Control
1	Delay Time	64th/3 – 4thx6	0 – 19	table#14	
2	Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
3	Feedback High Dump	0.1 – 1.0	1 – 10		
4	L/R Diffusion	-63ms – 0ms – 63ms	1 – 64 – 127		
5	Lag	-63ms – 0ms – 63ms	1 – 64 – 127		
6					
7					
8					
9					
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11					
12					
13	EQ Low Frequency	32Hz – 2.0kHz	4 – 40		
14	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
15	EQ High Frequency	500Hz – 16.0kHz	28 – 58		
16	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		

TEMPO CROSS1,2,3,4

No.	Parameter	Display	Value	See Table	Control
1	Delay Time L>R	64th/3 – 4thx6	0 – 19	table#14	
2	Delay Time R>L	64th/3 – 4thx6	0 – 19	table#14	
3	Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
4	Input Select	L, R, L&R	0 – 2		
5	Feedback High Dump	0.1 – 1.0	1 – 10		
6	Lag	-63ms – 0ms – 63ms	1 – 64 – 127		
7					
8					
9					
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11					
12					
13	EQ Low Frequency	32Hz – 2.0kHz	4 – 40		
14	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
15	EQ High Frequency	500Hz – 16.0kHz	28 – 58		
16	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		

ER/KARAOKE

KARAOKE1,2,3

No.	Parameter	Display	Value	See Table	Control
1	Delay Time	0.1ms – 400.0ms	0 – 127	table#7	
2	Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
3	HPF Cutoff	Thru, 22Hz – 8.0kHz	0, 1 – 52	table#3	
4	LPF Cutoff	1.0kHz – 18kHz, Thru	34 – 59, 60	table#3	
5					
6					
7					
8					
9					
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11	Density	0 – 3	0 – 3		
12					
13					
14					
15					
16					

ER1, ER2

No.	Parameter	Display	Value	See Table	Control
1	Type	S-H, L-H, Rdm, Rvs, Plt, Spr	0 – 5		
2	Room Size	0.1 – 20.0	0 – 127	table#6	
3	Diffusion	0 – 10	0 – 10		
4	Initial Delay	0.1ms – 200.0ms	0 – 127	table#5	
5	Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
6	HPF Cutoff	Thru, 22Hz – 8.0kHz	0, 1 – 52	table#3	
7	LPF Cutoff	1.0kHz – 18kHz, Thru	34 – 59, 60	table#3	
8					
9					
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11	Liveness	0 – 10	0 – 10		
12	Density	0 – 3	0 – 3		
13	High Damp	0.1 – 1.0	1 – 10		
14					
15					
16					

GATE REVERB1, GATE REVERB2, REVERSE GATE

No.	Parameter	Display	Value	See Table	Control
1	Type	TypeA, TypeB	0 – 1		
2	Room Size	0.1 – 20.0	0 – 127	table#6	
3	Diffusion	0 – 10	0 – 10		
4	Initial Delay	0.1ms – 200.0ms	0 – 127	table#5	
5	Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
6	HPF Cutoff	Thru, 22Hz – 8.0kHz	0, 1 – 52	table#3	
7	LPF Cutoff	1.0kHz – 18kHz, Thru	34 – 59, 60	table#3	
8					
9					
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11	Liveness	0 – 10	0 – 10		
12	Density	0 – 3	0 – 3		
13	High Damp	0.1 – 1.0	1 – 10		
14					
15					
16					

CHORUS

CHORUS1,2,3,4,5,6,7,8, CHORUS FAST, CHORUS LITE, GM CHORUS1,2,3,4, FB CHORUS, CELESTE1,2

No.	Parameter	Display	Value	See Table	Control
1	LFO Frequency	0.00Hz – 39.7Hz	0 – 127	table#1	
2	LFO Depth	0 – 127	0 – 127	table#19	
3	Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#17	
4	Delay Offset	0.0ms – 50ms	0 – 127	table#2	
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11	EQ Mid Frequency (*2,3)	100Hz – 10.0kHz	14 – 54	table#3	
12	EQ Mid Gain (*2,3)	-12dB – 0dB – +12dB	52 – 64 – 76		
13	EQ Mid Width (*2,3)	0.1 – 12.0	1 – 120		
14					
15	Input Mode	mono, stereo	0 – 1		
16					

SYMPHONIC1, SYMPHONIC2

No.	Parameter	Display	Value	See Table	Control
1	LFO Frequency	0.00Hz – 39.7Hz	0 – 127	table#1	
2	LFO Depth	0 – 127	0 – 127	table#19	
3	Delay Offset	0.0ms – 50ms	0 – 127	table#2	
4					
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11	EQ Mid Frequency (*2,3)	100Hz – 10.0kHz	14 – 54	table#3	
12	EQ Mid Gain (*2,3)	-12dB – 0dB – +12dB	52 – 64 – 76		
13	EQ Mid Width (*2,3)	0.1 – 12.0	1 – 120		
14					
15					
16					

ENS DETUNE1, ENS DETUNE2

No.	Parameter	Display	Value	See Table	Control
1	Detune	-50cent – 0cent – +50cent	14 – 64 – 114		
2	Lch Init Delay	0.0ms – 50ms	0 – 127	table#2	
3	Rch Init Delay	0.0ms – 50ms	0 – 127	table#2	
4					
5					
6					
7					
8					
9					
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
12	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
13	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
14	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
15					
16					

FLANGER

FLANGER1,2,3,4,5, GM FLANGER

No.	Parameter	Display	Value	See Table	Control
1	LFO Frequency	0.00Hz – 39.7Hz	0 – 127	table#1	
2	LFO Depth	0 – 127	0 – 127	table#19	
3	Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#17	
4	Delay Offset	0.0ms – 50ms	0 – 127	table#2	
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11	EQ Mid Frequency (*2,3)	100Hz – 10.0kHz	14 – 54	table#3	
12	EQ Mid Gain (*2,3)	-12dB – 0dB – +12dB	52 – 64 – 76		
13	EQ Mid Width (*2,3)	0.1 – 12.0	1 – 120		
14	LFO Phase Difference	-180deg – 0deg – +180deg	4 – 64 – 124	resolution= 3deg.	
15					
16					

VINTAGE FLANGER

No.	Parameter	Display	Value	See Table	Control
1	Speed	0.040Hz – 10.00Hz	0 – 235	table#25	●
2	Manual	0 – 127	0 – 127		
3	Depth	0 – 127	0 – 127		
4	Feedback	0 – 127	0 – 127		
5	Type	1 – 3	0 – 2		
6	Spread	0 – 127	0 – 127		
7	Mix	0 – 127	0 – 127		
8					
9					
10					
11					
12					
13					
14					
15					
16					

V_FLANGER

No.	Parameter	Display	Value	See Table	Control
1	LFO Freq	0.00Hz – 39.7Hz	0 – 127	table#1	
2	LFO Depth	0 – 127	0 – 127	table#19	
3	LFO Wave	Triangle, Sine, Random	0 – 2		
4	Delay Offset	0.09ms – 36.21ms	0 – 139	table#23	
5	Feedback Level	-100% – 0% – +100%	0 – 100 – 200		
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11	EQ Mid Frequency	100Hz – 10.0kHz	14 – 54	table#3	
12	EQ Mid Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
13	EQ Mid Width	0.1 – 12.0	1 – 120		
14	Modulation Phase	-180deg – 0deg – +180deg	0 – 8 – 16	table#24	
15	Feedback High Damp	0.1 – 1.0	1 – 10		
16	Analog Feel	0 – 10	0 – 10		

T_FLANGER

No.	Parameter	Display	Value	See Table	Control
1	LFO Freq	16th – 4thx16	5 – 29	table#14	
2	LFO Depth	0 – 127	0 – 127	table#19	
3	Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#17	
4	Delay Offset	0.0ms – 50ms	0 – 127	table#2	
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11	EQ mid frequency	100Hz – 10.0kHz	14 – 54	table#3	
12	EQ mid gain	-12dB – 0dB – +12dB	52 – 64 – 76		
13	EQ mid width	0.1 – 12.0	1 – 120		
14	LFO phase difference	-180deg – 0deg – +180deg	4 – 64 – 124	resolution= 3deg.	
15					
16					

DYN FLANGER

No.	Parameter	Display	Value	See Table	Control
1	Sensitivity	0 – 127	0 – 127		●
2	Delay Time Offset	0 – 127	0 – 127		
3	Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#17	
4	Attack Time	0.3ms – 227ms	0 – 127	table#20	
5	Release Time	2.6ms – 2171.4ms	0 – 127	table#21	
6	Release Curve	0 – 127	0 – 127		
7	Direction	Up, Down	0 – 1		
8	Dyna Threshold Level	0 – 127	0 – 127		
9	Dyna Level Offset	0 – 127	0 – 127		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	
11					
12					
13	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
14	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
15	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
16	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		

PHASER

PHASER1, EP PHASER1,2,3

No.	Parameter	Display	Value	See Table	Control
1	LFO Frequency	0.00Hz – 39.7Hz	0 – 127	table#1	
2	LFO Depth	0 – 127	0 – 127	table#19	
3	Phase Shift Offset	0 – 127	0 – 127		
4	Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11	Stage	4 – 22 (*2) 4 – 12 (*3)	4 – 22 4 – 12		
12	Diffusion	mono, stereo	0 – 1		
13					
14					
15					
16					

PHASER2, PHASER3

No.	Parameter	Display	Value	See Table	Control
1	LFO Frequency	0.00Hz – 39.7Hz	0 – 127	table#1	
2	LFO Depth	0 – 127	0 – 127	table#19	
3	Phase Shift Offset	0 – 127	0 – 127		
4	Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11	Stage	3 – 11	3 – 11		
12					
13	LFO Phase Difference	-180deg – 0deg – +180deg	4 – 64 – 124	resolution= 3deg.	
14					
15					
16					

VINTAGE PHASER MONO

No.	Parameter	Display	Value	See Table	Control
1	Speed	0.100Hz – 10.00Hz	0 – 252	table#26	●
2	Manual	0 – 127	0 – 127		
3	Depth	0 – 127	0 – 127		
4	Feedback	0 – 127	0 – 127		
5	Stage	4, 6, 8, 10, 12, 16	0 – 5		
6	Mode	1, 2, 3	0 – 2		
7	Color	0 – 127	0 – 127		
8					
9					
10					
11					
12					
13					
14					
15					
16					

In the case of the following settings, Color is not effective.
When Stage is set to 4, 6, 8, 12 or 16 at Mode = 1, and 4 or 10 at Mode = 2.

VINTAGE PHASER STEREO

No.	Parameter	Display	Value	See Table	Control
1	Speed	0.100Hz – 10.00Hz	0 – 252	table#26	●
2	Manual	0 – 127	0 – 127		
3	Depth	0 – 127	0 – 127		
4	Feedback	0 – 127	0 – 127		
5	Stage	4, 6, 8, 10	0 – 3		
6	Mode	1, 2	0 – 1		
7	Color	0 – 127	0 – 127		
8	Spread	0 – 127	0 – 127		
9					
10					
11					
12					
13					
14					
15					
16					

In the case of the following settings, Color is not effective.
When Stage is set to 4, 6 or 8 at Mode = 1, and 4 or 10 at Mode = 2.

T_PHASER1, T_PHASER2

No.	Parameter	Display	Value	See Table	Control
1	LFO Freq	16th – 4thx16	5 – 29	table#14	
2	LFO Depth	0 – 127	0 – 127	table#19	
3	Phase Shift Offset	0 – 127	0 – 127		
4	Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		

No.	Parameter	Display	Value	See Table	Control
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11	Stage	3 – 11	3 – 11		
12					
13	LFO phase difference	-180deg – 0deg – +180deg	4 – 64 – 124	resolution= 3deg.	
14					
15					
16					

DYN PHASER

No.	Parameter	Display	Value	See Table	Control
1	Sensitivity	0 – 127	0 – 127		●
2	Dyna Level Offset	0 – 127	0 – 127		
3	Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
4	Attack Time	0.3ms – 227ms	0 – 127	table#20	
5	Release Time	2.6ms – 2171.4ms	0 – 127	table#21	
6	Release Curve	0 – 127	0 – 127		
7	Direction	Up, Down	0 – 1		
8	Dyna Threshold Level	0 – 127	0 – 127		
9					
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	
11	Stage	4, 5, 6	4 – 6		
12					
13	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
14	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
15	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
16	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		

DISTORTION

V_DIST WARM, V_DIST CLS H, V_DIST CLS S, V_DIST METAL, V_DIST CRUNC, V_DIST BLUES, V_DIST EDGY, V_DIST SOLID, V_DST CLEAN1, V_DST CLEAN2, V_DIST TWIN, V_DST JZ CLN, V_DIST HARD, V_DSIT SOFT

No.	Parameter	Display	Value	See Table	Control
1	Overdrive	0% – 100%	0 – 100		
2	Device	Transistor, Vintage Tube, Dist1, Dist2, Fuzz	0 – 4		
3	Speaker	Flat, Stack, Combo, Twin, Radio, Megaphone	0 – 5		
4	Presence	0 – 20	0 – 20		
5	Output Level	0% – 100%	0 – 100		
6					
7					
8					
9					
10	Dry/Wet Balance	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11					
12					
13					
14					
15					
16					

V_DIST ROCA, V_DST FUSION

No.	Parameter	Display	Value	See Table	Control
1	Overdrive	0% – 100%	0 – 100		
2	Device	Transistor, Vintage Tube, Dist1, Dist2, Fuzz	0 – 4		
3	Speaker	Flat, Stack, Combo, Twin, Radio, Megaphone	0 – 5		
4	Presence	0 – 20	0 – 20		
5	Output Level	0% – 100%	0 – 100		
6	Delay Time	64th/3 – 4thx6	0 – 19	table#14	
7	Delay Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
8	L/R Diffusion	-63ms – 0ms – 63ms	1 – 64 – 127		
9	Lag	-63ms – 0ms – 63ms	1 – 64 – 127		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11	Delay Mix	0 – 127	0 – 127		
12	Feedback High Dump	0.1 – 1.0	1 – 10		
13					
14					
15					
16					

ST AMP SOLID, ST AMP CRUNC, ST AMP BLUES, ST AMP CLEAN, ST AMP HARP, ST DIST HARD, ST DIST SOFT, ST AMP1,2,3,4,5,6

No.	Parameter	Display	Value	See Table	Control
1	Drive	0 – 127	0 – 127		●
2	AMP Type	Off, Stack, Combo, Tube	0 – 3		
3	LPF Cutoff	1.0kHz – 18kHz, Thru	34 – 59, 60	table#3	
4	Output Level	0 – 127	0 – 127	table#18	
5					
6					
7					
8					
9					
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	
11	Edge(Clip Curve)	0 – 127(mild – sharp)	0 – 127		
12					
13					
14					
15					
16					

DIST HARD1, DIST HARD2, DIST SOFT1, DIST SOFT2, AMP SIM1

No.	Parameter	Display	Value	See Table	Control
1	Drive	0 – 127	0 – 127		●
2	AMP Type	Off, Stack, Combo, Tube	0 – 3		
3	LPF Cutoff	1.0kHz – 18kHz, Thru	34 – 59, 60	table#3	
4	Output Level	0 – 127	0 – 127	table#18	
5					
6					
7					
8					
9					
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	
11	Edge(Clip Curve)	0 – 127(mild – sharp)	0 – 127		
12					
13					
14					
15					
16					

DIST HEAVY, OVERDRIVE

No.	Parameter	Display	Value	See Table	Control
1	Drive	0 – 127	0 – 127		●
2	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
3	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
4	LPF Cutoff	1.0kHz – 18kHz, Thru	34 – 59, 60	table#3	
5	Output Level	0 – 127	0 – 127	table#18	
6					
7	EQ Mid Frequency	100Hz – 10.0kHz	14 – 54	table#3	
8	EQ Mid Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
9	EQ Mid Width	0.1 – 12.0	1 – 120		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	
11	Edge(Clip Curve)	0 – 127(mild – sharp)	0 – 127		
12					
13					
14					
15					
16					

ST DIST, ST OD

No.	Parameter	Display	Value	See Table	Control
1	Drive	0 – 127	0 – 127		●
2	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
3	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
4	LPF Cutoff	1.0kHz – 18kHz, Thru	34 – 59, 60	table#3	
5	Output Level	0 – 127	0 – 127	table#18	
6					
7	EQ Mid Frequency	100Hz – 10.0kHz	14 – 54	table#3	
8	EQ Mid Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
9	EQ Mid Width	0.1 – 12.0	1 – 120		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	
11	Edge(Clip Curve)	0 – 127	0 – 127		
12					
13					
14					
15					
16					

AMP SIM2

No.	Parameter	Display	Value	See Table	Control
1	Drive	0 – 127	0 – 127		●
2	AMP Type	Off, Stack, Combo, Tube, Crunch, Hi gain, British	0 – 6		
3	LPF Cutoff	1.0kHz – 18kHz, Thru	34 – 59, 60	table#3	
4	Output Level	0 – 127	0 – 127	table#18	
5					
6					
7					
8					
9					
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	
11					
12					
13					
14					
15					
16					

DISTORTION+

DST+DELAY1, DST+DELAY2, OD+DELAY1, OD+DELAY2

No.	Parameter	Display	Value	See Table	Control
1	Lch Delay Time	0.1ms – 1638.3ms	1 – 16383		
2	Rch Delay Time	0.1ms – 1638.3ms	1 – 16383		
3	Delay Feedback Time	0.1ms – 1638.3ms	1 – 16383		
4	Delay Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
5	Delay Mix	0 – 127	0 – 127		
6	Dist Drive	0 – 127	0 – 127		
7	Dist Output Level	0 – 127	0 – 127	table#18	
8	Dist EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
9	Dist EQ Mid Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11					
12					
13					
14					
15					
16					

CMP+DST+DLY1, CMP+DST+DLY2, CMP+OD+DLY1, CMP+OD+DLY2

No.	Parameter	Display	Value	See Table	Control
1	Delay Time	0.1ms – 1638.3ms	1 – 16383		
2	Delay Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
3	Delay Mix	0 – 127	0 – 127		
4	Dist Drive	0 – 127	0 – 127		
5	Dist Output Level	0 – 127	0 – 127	table#18	
6	Dist EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
7	Dist EQ Mid Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8					
9					
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11	Comp. Attack	1ms – 40ms	0 – 19	table#8	
12	Comp. Release	10ms – 680ms	0 – 15	table#9	
13	Comp. Threshold	-48dB – -6dB	79 – 121		
14	Comp. Ratio	1.0 – 20.0	0 – 7	table#10	
15					
16					

V_DST H+DLY, V_DST S+DLY

No.	Parameter	Display	Value	See Table	Control
1	Overdrive	0% – 100%	0 – 100		
2	Device	Transistor, Vintage Tube, Dist1, Dist2, Fuzz	0 – 4		
3	Speaker	Flat, Stack, Combo, Twin, Radio, Megaphone	0 – 5		
4	Presence	0 – 20	0 – 20		
5	Output Level	0% – 100%	0 – 100		
6	Delay Time L	0.1ms – 1638.3ms	1 – 16383		
7	Delay Time R	0.1ms – 1638.3ms	1 – 16383		
8	Delay Feedback Time	0.1ms – 1638.3ms	1 – 16383		
9	Delay Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
10	Dry/Wet Balance	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11	Delay Mix	0 – 127	0 – 127		
12	Feedback High Dump	0.1 – 1.0	1 – 10		
13					
14					
15					
16					

DST+TDLY, OD+TDLY

No.	Parameter	Display	Value	See Table	Control
1	Delay Time	64th/3 – 4thx6	0 – 19	table#14	
2	Delay Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
3	Delay Mix	0 – 127	0 – 127		
4	Dist Drive	0 – 127	0 – 127		
5	Dist Output Level	0 – 127	0 – 127	table#18	
6	Dist EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
7	Dist EQ Mid Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	L/R Diffusion	-63ms – 0ms – 63ms	1 – 64 – 127		
9	Lag	-63ms – 0ms – 63ms	1 – 64 – 127		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11					
12					
13					
14					
15					
16					

COMP+DIST1, COMP+DIST2

No.	Parameter	Display	Value	See Table	Control
1	Drive	0 – 127	0 – 127		●
2	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
3	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
4	LPF Cutoff	1.0kHz – 18kHz, Thru	34 – 59, 60	table#3	
5	Output Level	0 – 127	0 – 127	table#18	

No.	Parameter	Display	Value	See Table	Control
6					
7	EQ Mid Frequency	100Hz – 10.0kHz	14 – 54	table#3	
8	EQ Mid Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
9	EQ Mid Width	0.1 – 12.0	1 – 120		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	
11	Edge(Clip Curve)	0 – 127(mild – sharp)	0 – 127		
12	Attack	1ms – 40ms	0 – 19	table#8	
13	Release	10ms – 680ms	0 – 15	table#9	
14	Threshold	-48dB – -6dB	79 – 121		
15	Ratio	1.0 – 20.0	0 – 7	table#10	
16					

CMP+DST+TDL, CMP+OD+TDLY1,2,3,4,5,6

No.	Parameter	Display	Value	See Table	Control
1	Delay Time	64th/3 – 4thx6	0 – 19	table#14	
2	Delay Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
3	Delay Mix	0 – 127	0 – 127		
4	Dist Drive	0 – 127	0 – 127		
5	Dist Output Level	0 – 127	0 – 127	table#18	
6	Dist EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
7	Dist EQ Mid Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	L/R Diffusion	-63ms – 0ms – 63ms	1 – 64 – 127		
9	Lag	-63ms – 0ms – 63ms	1 – 64 – 127		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11	Comp. Attack	1ms – 40ms	0 – 19	table#8	
12	Comp. Release	10ms – 680ms	0 – 15	table#9	
13	Comp. Threshold	-48dB – -6dB	79 – 121		
14	Comp. Ratio	1.0 – 20.0	0 – 7	table#10	
15					
16					

V_DST H+TDL1, V_DST H+TDL2, V_DST S+TDL1, V_DST S+TDL2

No.	Parameter	Display	Value	See Table	Control
1	Overdrive	0% – 100%	0 – 100		
2	Device	Transistor, Vintage Tube, Dist1, Dist2, Fuzz	0 – 4		
3	Speaker	Flat, Stack, Combo, Twin, Radio, Megaphone	0 – 5		
4	Presence	0 – 20	0 – 20		
5	Output Level	0% – 100%	0 – 100		
6	Delay Time	64th/3 – 4thx6	0 – 19	table#14	
7	Delay Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
8	L/R Diffusion	-63ms – 0ms – 63ms	1 – 64 – 127		
9	Lag	-63ms – 0ms – 63ms	1 – 64 – 127		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11	Delay Mix	0 – 127	0 – 127		
12	Feedback High Dump	0.1 – 1.0	1 – 10		
13					
14					
15					
16					

PITCH CHANGE

PITCH CHG1, PITCH CHG2

No.	Parameter	Display	Value	See Table	Control
1	Pitch	-24 – +24	40 – 88		
2	Initial Delay	0.1ms – 400.0ms	0 – 127	table#7	
3	Fine 1	-50cent – 0cent – +50cent	14 – 64 – 114		
4	Fine 2	-50cent – 0cent – +50cent	14 – 64 – 114		
5	Feedback Level	-63 – 0 – +63	1 – 64 – 127		
6					
7					
8					
9					
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11	Pan 1	L63 – C – R63	1 – 64 – 127		
12	Output Level 1	0 – 127	0 – 127	table#18	
13	Pan 2	L63 – C – R63	1 – 64 – 127		
14	Output Level 2	0 – 127	0 – 127	table#18	
15					
16					

PITCH CHG3

No.	Parameter	Display	Value	See Table	Control
1	Pitch	-24 – +24	40 – 88		
2	Initial Delay	0.1ms – 400.0ms	0 – 127	table#7	
3	Fine 1	-50cent – 0cent – +50cent	14 – 64 – 114		
4	Fine 2	-50cent – 0cent – +50cent	14 – 64 – 114		
5	Feedback Level	-63 – 0 – +63	1 – 64 – 127		
6					
7					
8					
9					
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●

No.	Parameter	Display	Value	See Table	Control
11	Pan 1	L63 – C – R63	1 – 64 – 127		
12	Output Level 1	0 – 127	0 – 127	table#18	
13	Pan 2	L63 – C – R63	1 – 64 – 127		
14	Output Level 2	0 – 127	0 – 127	table#18	
15					
16					

WAH AUTO

AUTO WAH1, AUTO WAH2

No.	Parameter	Display	Value	See Table	Control
1	LFO Frequency	0.00Hz – 39.7Hz	0 – 127	table#1	
2	LFO Depth	0 – 127	0 – 127	table#19	
3	Cutoff Frequency Offset	0 – 127	0 – 127		●
4	Resonance	1.0 – 12.0	10 – 120		
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	
11	Drive	0 – 127	0 – 127		
12					
13					
14					
15					
16					

VINTAGE AUTO WAH

No.	Parameter	Display	Value	See Table	Control
1	Speed	0.100Hz – 20.00Hz	0 – 254	table#27	●
2	Bottom	0 – 127	0 – 127		
3	Top	0 – 127	0 – 127		
4	Resonance Offset	-12.0 – +12.0	40 – 88		
5	LFO Wave	Sin, Trp	0 – 1		
6	Type	High, Mid, Low, Bass	0 – 3		
7	Overdrive	0.0dB – +40.0dB	0 – 80		
8	Output	-20.0dB – 0.0dB – +10.0dB	24 – 64 – 84		
9					
10					
11					
12					
13					
14					
15					
16					

AT.WAH+DST1,2, AT.WH+DST HD, AT.WH+DST HV, AT.WH+DST LT
AT.WAH+OD1,2, AT.WH+OD HD, AT.WH+OD HV, AT.WH+OD LT

No.	Parameter	Display	Value	See Table	Control
1	LFO Frequency	0.00Hz – 39.7Hz	0 – 127	table#1	
2	LFO Depth	0 – 127	0 – 127	table#19	
3	Cutoff Frequency Offset	0 – 127	0 – 127		●
4	Resonance	1.0 – 12.0	10 – 120		
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	
11	Drive	0 – 127	0 – 127		
12	EQ Low Gain (distortion)	-12dB – 0dB – +12dB	52 – 64 – 76		
13	EQ Mid Gain (distortion)	-12dB – 0dB – +12dB	52 – 64 – 76		
14	LPF Cutoff	1.0kHz – 18kHz, Thru	34 – 59, 60	table#3	
15	Output Level	0 – 127	0 – 127	table#18	
16					

TEMPO AT.WAH

No.	Parameter	Display	Value	See Table	Control
1	LFO Freq	16th – 4thx16	5 – 29	table#14	
2	LFO Depth	0 – 127	0 – 127	table#19	
3	Cutoff Frequency Offset	0 – 127	0 – 127		●
4	Resonance	1.0 – 12.0	10 – 120		
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	
11	Drive	0 – 127	0 – 127		
12					

No.	Parameter	Display	Value	See Table	Control
13					
14					
15					
16					

T_AT.WH+DST, T_A.WH+DSTHD, T_A.WH+DSTHV, T_A.WH+DSTLT
T_AT.WH+OD, T_A.WH+OD HD, T_A.WH+OD HV, T_A.WH+OD LT

No.	Parameter	Display	Value	See Table	Control
1	LFO Freq	16th – 4thx16	5 – 29	table#14	
2	LFO Depth	0 – 127	0 – 127	table#19	
3	Cutoff Frequency Offset	0 – 127	0 – 127		●
4	Resonance	1.0 – 12.0	10 – 120		
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	
11	Drive	0 – 127	0 – 127		
12	EQ Low Gain(distortion)	-12dB – 0dB – +12dB	52 – 64 – 76		
13	EQ Mid Gain(distortion)	-12dB – 0dB – +12dB	52 – 64 – 76		
14	LPF Cutoff	1.0kHz – 18kHz, Thru	34 – 59, 60	table#3	
15	Output Level	0 – 127	0 – 127	table#18	
16					

WAH TCH/PDL

TOUCH WAH1, TC.WH+DST1, TC.WH+DST2

No.	Parameter	Display	Value	See Table	Control
1	Sensitivity	0 – 127	0 – 127		
2	Cutoff Frequency Offset	0 – 127	0 – 127		●
3	Resonance	1.0 – 12.0	10 – 120		
4					
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	
11	Drive	0 – 127	0 – 127		
12					
13					
14					
15					
16					

TOUCH WAH2, TOUCH WAH3, TC.WH+DST HD, TC.WH+DST HV, TC.WH+DST LT, TC.WH+OD1,2, TC.WH+OD HD, TC.WH+OD HV, TC.WH+OD LT, CLAVI TC.WAH, EP TC.WAH

No.	Parameter	Display	Value	See Table	Control
1	Sensitivity	0 – 127	0 – 127		
2	Cutoff Frequency Offset	0 – 127	0 – 127		●
3	Resonance	1.0 – 12.0	10 – 120		
4					
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	
11	Drive	0 – 127	0 – 127		
12	EQ Low Gain (distortion)	-12dB – 0dB – +12dB	52 – 64 – 76		
13	EQ Mid Gain (distortion)	-12dB – 0dB – +12dB	52 – 64 – 76		
14	LPF Cutoff	1.0kHz – 18kHz, Thru	34 – 59, 60	table#3	
15	Output Level	0 – 127	0 – 127	table#18	
16	Release	10ms – 680ms	52 – 67	table#12	

VINTAGE TOUCH WAH

No.	Parameter	Display	Value	See Table	Control
1	Sensitivity	0 – 127	0 – 127		●
2	Bottom	0 – 127	0 – 127		
3	Top	0 – 127	0 – 127		
4	Resonance Offset	-12.0 – +12.0	40 – 88		
5	Direction	Up, Down	0 – 1		
6	Type	High, Mid, Low, Bass	0 – 3		
7	Overdrive	0.0dB – +40.0dB	0 – 80		
8	Output	-20.0dB – 0.0dB – +10.0dB	24 – 64 – 84		
9	—				
10	—				
11	Attack Offset	-5 – +5	59 – 69		

No.	Parameter	Display	Value	See Table	Control
12					
13					
14					
15					
16					

WH+DST+DLY1, WH+DST+DLY2, WH+OD+DLY1, WH+OD+DLY2

No.	Parameter	Display	Value	See Table	Control
1	Delay Time	0.1ms – 1638.3ms	1 – 16383		
2	Delay Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
3	Delay Mix	0 – 127	0 – 127		
4	Dist Drive	0 – 127	0 – 127		
5	Dist Output Level	0 – 127	0 – 127	table#18	
6	Dist EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
7	Dist EQ Mid Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8					
9					
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11	Wah Sensitivity	0 – 127	0 – 127		
12	Wah Cutoff Freq Offset	0 – 127	0 – 127		
13	Wah Resonance	1.0 – 12.0	10 – 120		
14	Wah Release	10ms – 680ms	52 – 67	table#12	
15					
16					

WH+DST+TDLY, WH+OD+TDLY1, WH+OD+TDLY2

No.	Parameter	Display	Value	See Table	Control
1	Delay Time	64th/3 – 4thx6	0 – 19	table#14	
2	Delay Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#16	
3	Delay Mix	0 – 127	0 – 127		
4	Dist Drive	0 – 127	0 – 127		
5	Dist Output Level	0 – 127	0 – 127	table#18	
6	Dist EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
7	Dist EQ Mid Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	L/R Diffusion	-63ms – 0ms – 63ms	1 – 64 – 127		
9	Lag	-63ms – 0ms – 63ms	1 – 64 – 127		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11	Wah Sensitivity	0 – 127	0 – 127		
12	Wah Cutoff Freq Offset	0 – 127	0 – 127		
13	Wah Resonance	1.0 – 12.0	10 – 120		
14	Wah Release	10ms – 680ms	52 – 67	table#12	
15					
16					

V.PEDAL WH B, V.PEDAL WH D

No.	Parameter	Display	Value	See Table	Control
1	Pedal Control	0 – 127	0 – 127		●
2	Bottom	0 – 127	0 – 127		
3	Top	0 – 127	0 – 127		
4	Resonance Offset	-12.0 – +12.0	40 – 88		
5	Direction	Up, Down	0 – 1		
6	Type	High, Mid, Low, Bass	0 – 3		
7	OverDrive	0.0dB – +40.0dB	0 – 80		
8	Output	-20.0dB – 0.0dB – +10.0dB	24 – 64 – 84		
9					
10					
11					
12					
13	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
14	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
15	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
16	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		

PEDAL WAH

No.	Parameter	Display	Value	See Table	Control
1	Pedal Control	0 – 127	0 – 127		●
2	Depth	0 – 127	0 – 127	table#19	
3	Cutoff Frequency Offset	0 – 127	0 – 127		
4	Resonance	1.0 – 12.0	10 – 120		
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	
11	Drive	0 – 127	0 – 127		
12					
13					
14					
15					
16					

PEDAL WH+DST, P.WH+DIST HD, P.WH+DIST HV, P.WH+DIST LT
PEDAL WH+OD, P.WH+OD HD, P.WH+OD HV, P.WH+OD LT

No.	Parameter	Display	Value	See Table	Control
1	Pedal Control	0 – 127	0 – 127		●
2	Depth	0 – 127	0 – 127	table#19	
3	Cutoff Frequency Offset	0 – 127	0 – 127		
4	Resonance	1.0 – 12.0	10 – 120		
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	
11	Drive	0 – 127	0 – 127		
12	EQ Low Gain (distortion)	-12dB – 0dB – +12dB	52 – 64 – 76		
13	EQ Mid Gain (distortion)	-12dB – 0dB – +12dB	52 – 64 – 76		
14	LPF Cutoff	1.0kHz – 18kHz, Thru	34 – 59, 60	table#3	
15	Output Level	0 – 127	0 – 127	table#18	
16					

DYNAMIC

COMP MED, COMP HEAVY, COMPRESSOR

No.	Parameter	Display	Value	See Table	Control
1	Attack	1ms – 40ms	0 – 19	table#8	
2	Release	10ms – 680ms	0 – 15	table#9	
3	Threshold	-48dB – -6dB	79 – 121		
4	Ratio	1.0 – 20.0	0 – 7	table#10	
5	Output Level	0 – 127	0 – 127	table#18	
6					
7					
8					
9					
10					
11					
12					
13					
14					
15					
16					

COMP MELODY, COMP BASS, MBAND COMP

No.	Parameter	Display	Value	See Table	Control
1	Type	Normal, Low, Mid, High, Low/High, Low/Mid, Mid/High, Full Bit, Wild, Attacky, Low End, Hard, Basic	0 – 12		
2	Threshold Offset	-32 – +32	32 – 96		●
3	Low Gain Offset	-63 – 0 – +63	1 – 64 – 127		
4	Mid Gain Offset	-63 – 0 – +63	1 – 64 – 127		
5	High Gain Offset	-63 – 0 – +63	1 – 64 – 127		
6					
7					
8					
9					
10					
11					
12					
13					
14					
15					
16					

VINTAGE COMPRESSOR 376

No.	Parameter	Display	Value	See Table	Control
1	Input Level	-∞ – 0.00dB	0 – 200	table#28	
2	Output Level	-∞ – 0.00dB	0 – 200	table#28	
3	Ratio	2, 4, 8, 12, 20	0 – 4		
4	Attack	0.022ms – 50.40ms	0 – 200	table#29	
5	Release	10.88ms – 544.22ms	0 – 200	table#30	
6					
7					
8					
9					
10					
11					
12					
13					
14					
15					
16					

NOISE GATE

No.	Parameter	Display	Value	See Table	Control
1	Attack	1ms – 40ms	0 – 19	table#8	
2	Release	10ms – 680ms	0 – 15	table#9	
3	Threshold	-72dB – -30dB	55 – 97		
4	Output Level	0 – 127	0 – 127	table#18	
5					
6					
7					
8					
9					
10					
11					
12					
13					
14					
15					
16					

ROTARY SP

DUAL ROT BRT, DUAL ROT WRM, DUAL ROT SP1,2

No.	Parameter	Display	Value	See Table	Control
1	Rotor Speed Slow	0.00Hz – 2.65Hz	0 – 63	table#1	
2	Horn Speed Slow	0.00Hz – 2.65Hz	0 – 63	table#1	
3	Rotor Speed Fast	2.69Hz – 39.7Hz	64 – 127	table#1	
4	Horn Speed Fast	2.69Hz – 39.7Hz	64 – 127	table#1	
5	Slow-Fast Time of R	0 – 127	0 – 127		
6	Slow-Fast Time of H	0 – 127	0 – 127		
7	Drive Low	0 – 127	0 – 127		
8	Drive High	0 – 127	0 – 127		
9	Low/High Balance	L63>H – L=H – L<H63	1 – 64 – 127		
10					
11	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
12	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
13	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
14	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
15	Mic L-R Angle	0deg – 180deg	0 – 60		
16	Speed Control	Slow, Fast	0 – 1		●

ROTARY SP1, ROTARY SP6

No.	Parameter	Display	Value	See Table	Control
1	LFO Frequency	0.00Hz – 39.7Hz	0 – 127	table#1	●
2	LFO Depth	0 – 127	0 – 127	table#19	
3					
4					
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	
11	EQ Mid Frequency (*2,3)	100Hz – 10.0kHz	14 – 54	table#3	
12	EQ Mid Gain (*2,3)	-12dB – 0dB – +12dB	52 – 64 – 76		
13	EQ Mid Width (*2,3)	0.1 – 12.0	1 – 120		
14					
15					
16					

ROTARY SP2,3,7

No.	Parameter	Display	Value	See Table	Control
1	LFO Frequency	0.00Hz – 39.7Hz	0 – 127	table#1	●
2	L/R Depth	0 – 127	0 – 127		
3	F/R Depth	0 – 127	0 – 127		
4	PAN Direction	L<->R, L->R, L<-R, Lturn, Rturn, L/R	0 – 5		
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10					
11	EQ Mid Frequency (*2,3)	100Hz – 10.0kHz	14 – 54	table#3	
12	EQ Mid Gain (*2,3)	-12dB – 0dB – +12dB	52 – 64 – 76		
13	EQ Mid Width (*2,3)	0.1 – 12.0	1 – 120		
14					
15					
16					

ROTARY SP4

No.	Parameter	Display	Value	See Table	Control
1	LFO Frequency	0.00Hz – 39.7Hz	0 – 127	table#1	●
2	AM Depth	0 – 127	0 – 127		
3	PM Depth	0 – 127	0 – 127		
4					
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10					
11	EQ Mid Frequency (*2,3)	100Hz – 10.0kHz	14 – 54	table#3	
12	EQ Mid Gain (*2,3)	-12dB – 0dB – +12dB	52 – 64 – 76		
13	EQ Mid Width (*2,3)	0.1 – 12.0	1 – 120		
14	LFO Phase Difference	-180deg – 0deg – +180deg	4 – 64 – 124	resolution= 3deg.	
15	Input Mode	mono, stereo	0 – 1		
16					

ROTARY SP5

No.	Parameter	Display	Value	See Table	Control
1	LFO Frequency	0.00Hz – 39.7Hz	0 – 127	table#1	
2	LFO Depth	0 – 127	0 – 127	table#19	
3	Feedback Level	-63 – 0 – +63	1 – 64 – 127	table#17	
4	Delay Offset	0.0ms – 50ms	0 – 127	table#2	
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11	EQ Mid Frequency (*2,3)	100Hz – 10.0kHz	14 – 54	table#3	
12	EQ Mid Gain (*2,3)	-12dB – 0dB – +12dB	52 – 64 – 76		
13	EQ Mid Width (*2,3)	0.1 – 12.0	1 – 120		
14					
15	Input Mode	mono, stereo	0 – 1		
16					

2WAY ROT SP

No.	Parameter	Display	Value	See Table	Control
1	Rotor Speed	0.00Hz – 39.7Hz	0 – 127	table#1	●
2	Drive Low	0 – 127	0 – 127		
3	Drive High	0 – 127	0 – 127		
4	Low/High	L63>H – L=H – L<H63	1 – 64 – 127		
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10					
11	Crossover Frequency	100Hz – 10.0kHz	14 – 54	table#3	
12	Mic L-R Angle	0deg – 180deg	0 – 60	resolution= 3deg.	
13					
14					
15					
16					

DST+ROT SP, OD+ROT SP

No.	Parameter	Display	Value	See Table	Control
1	LFO Frequency	0.00Hz – 39.7Hz	0 – 127	table#1	●
2	LFO Depth	0 – 127	0 – 127	table#19	
3					
4					
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	
11					
12					
13					
14	Drive	0 – 127	0 – 127		
15	LPF Cutoff	1.0kHz – 18kHz, Thru	34 – 59, 60	table#3	
16	Output Level	0 – 127	0 – 127	table#18	

DST+2ROT SP, OD+2ROT SP

No.	Parameter	Display	Value	See Table	Control
1	Rotor Speed	0.00Hz – 39.7Hz	0 – 127	table#1	●
2	Drive Low	0 – 127	0 – 127		
3	Drive High	0 – 127	0 – 127		
4	Low/High Balance	L63>H – L=H – L<H63	1 – 64 – 127		
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		

No.	Parameter	Display	Value	See Table	Control
10					
11	Crossover Frequency	100Hz – 10.0kHz	14 – 54	table#3	
12	Mic L-R Angle	0deg – 180deg	0 – 60		
13					
14	Drive	0 – 127	0 – 127		
15	LPF Cutoff	1.0kHz – 18kHz, Thru	34 – 59, 60	table#3	
16	Output Level	0 – 127	0 – 127	table#18	

AMP+ROT SP

No.	Parameter	Display	Value	See Table	Control
1	LFO Frequency	0.00Hz – 39.7Hz	0 – 127	table#1	●
2	LFO Depth	0 – 127	0 – 127	table#19	
3	AMP Type	Off, Stack, Combo, Tube	0 – 3		
4					
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	
11					
12					
13					
14	Drive	0 – 127	0 – 127		
15	LPF Cutoff	1.0kHz – 18kHz, Thru	34 – 59, 60	table#3	
16	Output Level	0 – 127	0 – 127	table#18	

AMP+2ROT SP

No.	Parameter	Display	Value	See Table	Control
1	Rotor Speed	0.00Hz – 39.7Hz	0 – 127	table#1	●
2	Drive Low	0 – 127	0 – 127		
3	Drive High	0 – 127	0 – 127		
4	Low/High Balance	L63>H – L=H – L<H63	1 – 64 – 127		
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10					
11	Crossover Frequency	100Hz – 10.0kHz	14 – 54	table#3	
12	Mic L-R Angle	0deg – 180deg	0 – 60		
13	AMP Type	Off, Stack, Combo, Tube(AMPSIM only)	0 – 3		
14	Drive	0 – 127	0 – 127		
15	LPF Cutoff	1.0kHz – 18kHz, Thru	34 – 59, 60	table#3	
16	Output Level	0 – 127	0 – 127	table#18	

TREMOLO

TREMOLO1, TREMOLO3, EP TREMOLO, GT TREMOLO2

No.	Parameter	Display	Value	See Table	Control
1	LFO Frequency	0.00Hz – 39.7Hz	0 – 127	table#1	●
2	AM Depth	0 – 127	0 – 127		
3	PM Depth	0 – 127	0 – 127		
4					
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10					
11	EQ Mid Frequency (*2,3)	100Hz – 10.0kHz	14 – 54	table#3	
12	EQ Mid Gain (*2,3)	-12dB – 0dB – +12dB	52 – 64 – 76		
13	EQ Mid Width (*2,3)	0.1 – 12.0	1 – 120		
14	LFO Phase Difference	-180deg – 0deg – +180deg	4 – 64 – 124	resolution= 3deg.	
15	Input Mode	mono, stereo	0 – 1		
16					

TREMOLO2, GT TREMOLO1

No.	Parameter	Display	Value	See Table	Control
1	LFO Frequency	0.00Hz – 39.7Hz	0 – 127	table#1	●
2	L/R Depth	0 – 127	0 – 127		
3	F/R Depth	0 – 127	0 – 127		
4	PAN Direction	L<->R, L->R, L<-R, Lturn, Rturn, L/R	0 – 5		
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10					
11	EQ Mid Frequency (*2,3)	100Hz – 10.0kHz	14 – 54	table#3	
12	EQ Mid Gain (*2,3)	-12dB – 0dB – +12dB	52 – 64 – 76		

No.	Parameter	Display	Value	See Table	Control
13	EQ Mid Width (*2,3)	0.1 – 12.0	1 – 120		
14					
15					
16					

VIBE VIBRATE

No.	Parameter	Display	Value	See Table	Control
1	Vibrate Speed	0.00Hz – 39.7Hz	0 – 127	table#1	
2	Vibrate Depth(AM)	0 – 127	0 – 127		
3	Vibrate Depth(PM)	0 – 127	0 – 127		
4					
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10	Dry/Wet Balance	D63>W – D=W – D<W63	1 – 64 – 127	table#15	
11	EQ Mid Frequency	100Hz – 10.0kHz	14 – 54	table#3	
12	EQ Mid Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
13	EQ Mid Width	0.1 – 12.0	1 – 120		
14	LFO Phase Difference	-180deg – 0deg – +180deg	4 – 64 – 124	resolution= 3deg.	
15	Input Mode	mono, stereo	0 – 1		
16	Vibrate SW	Off, On	0 – 1		●

T_TREMOLO

No.	Parameter	Display	Value	See Table	Control
1	LFO Freq	16th – 4thx16	5 – 29	table#14	●
2	AM Depth	0 – 127	0 – 127		
3	PM Depth	0 – 127	0 – 127		
4					
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10					
11	EQ Mid Frequency	100Hz – 10.0kHz	14 – 54	table#3	
12	EQ Mid Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
13	EQ Mid Width	0.1 – 12.0	1 – 120		
14	LFO Phase Difference	-180deg – 0deg – +180deg	4 – 64 – 124	resolution= 3deg.	
15	Input Mode	mono, stereo	0 – 1		
16					

SPATIAL

AUTO PAN1, AUTO PAN2, EP AUTO PAN

No.	Parameter	Display	Value	See Table	Control
1	LFO Frequency	0.00Hz – 39.7Hz	0 – 127	table#1	●
2	L/R Depth	0 – 127	0 – 127		
3	F/R Depth	0 – 127	0 – 127		
4	PAN Direction	L<->R, L->R, L<-R, Lturn, Rturn, L/R	0 – 5		
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10					
11	EQ Mid Frequency (*2,3)	100Hz – 10.0kHz	14 – 54	table#3	
12	EQ Mid Gain (*2,3)	-12dB – 0dB – +12dB	52 – 64 – 76		
13	EQ Mid Width (*2,3)	0.1 – 12.0	1 – 120		
14					
15					
16					

AUTO PAN3

No.	Parameter	Display	Value	See Table	Control
1	LFO Frequency	0.00Hz – 39.7Hz	0 – 127	table#1	●
2	L/R Depth	0 – 127	0 – 127		
3	F/R Depth	0 – 127	0 – 127		
4	PAN Direction	L<->R, L->R, L<-R, Lturn, Rturn, L/R	0 – 5		
5	LFO Wave	0 – 28	0 – 28		
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10					
11	EQ Mid Frequency (*2,3)	100Hz – 10.0kHz	14 – 54	table#3	
12	EQ Mid Gain (*2,3)	-12dB – 0dB – +12dB	52 – 64 – 76		
13	EQ Mid Width (*2,3)	0.1 – 12.0	1 – 120		
14					

No.	Parameter	Display	Value	See Table	Control
15	Input Mode	mono, stereo	0 – 1		
16					

T_AUTO PAN1

No.	Parameter	Display	Value	See Table	Control
1	LFO Freq	16th – 4thx16	5 – 29	table#14	●
2	L/R Depth	0 – 127	0 – 127		
3	F/R Depth	0 – 127	0 – 127		
4	PAN Direction	L<->R, L->R, L<-R, Lturn, Rturn, L/R	0 – 5		
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10					
11	EQ Mid Frequency	100Hz – 10.0kHz	14 – 54	table#3	
12	EQ Mid Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
13	EQ Mid Width	0.1 – 12.0	1 – 120		
14					
15					
16					

T_AUTO PAN2

No.	Parameter	Display	Value	See Table	Control
1	LFO Freq	16th – 4thx16	5 – 29	table#14	●
2	L/R Depth	0 – 127	0 – 127		
3	F/R Depth	0 – 127	0 – 127		
4	PAN Direction	L<->R, L->R, L<-R, Lturn, Rturn, L/R	0 – 5		
5	LFO Wave	0 – 28	0 – 28		
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10					
11	EQ Mid Frequency	100Hz – 10.0kHz	14 – 54	table#3	
12	EQ Mid Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
13	EQ Mid Width	0.1 – 12.0	1 – 120		
14					
15	Input Mode	mono, stereo	0 – 1		
16					

EQ/ENHANCER

EQ DISCO, EQ TEL, 3BAND EQ, ST 3BAND EQ

No.	Parameter	Display	Value	See Table	Control
1	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
2	EQ Mid Frequency	100Hz – 16.0kHz	14 – 58	table#3	
3	EQ Mid Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
4	EQ Mid Width	0.1 – 12.0	1 – 120		
5	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
6	EQ Low Frequency	50Hz – 2.0kHz	8 – 40	table#3	
7	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
8					
9					
10					
11					
12					
13					
14					
15	Input Mode	mono, stereo	0 – 1		
16					

2BAND EQ

No.	Parameter	Display	Value	See Table	Control
1	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
2	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
3	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
4	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
5					
6					
7					
8					
9					
10					
11					
12					
13					
14					
15					
16					

HM ENHANCE1, HM ENHANCE2

No.	Parameter	Display	Value	See Table	Control
1	HPF Cutoff	500Hz – 16.0kHz	28 – 58		
2	Drive	0 – 127	0 – 127		
3	Mix Level	0 – 127	0 – 127		
4					
5					
6					
7					
8					
9					
10					
11					
12					
13					
14					
15					
16					

MISC

VCE CANCEL

No.	Parameter	Display	Value	See Table	Control
1					
2					
3					
4					
5					
6					
7					
8					
9					
10					
11	Low Adjust	0 – 26	0 – 26		
12	High Adjust	0 – 26	0 – 26		
13					
14					
15					
16					

AMBIENCE

No.	Parameter	Display	Value	See Table	Control
1	Delay Time	0.0ms – 50ms	0 – 127	table#2	
2	Output Phase	normal, inverse	0 – 1		
3					
4					
5					
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11					
12					
13					
14					
15					
16					

TALKING MOD

No.	Parameter	Display	Value	See Table	Control
1	Vowel	a, i, u, e, o	0 – 4		●
2	Move speed	1 – 62	1 – 62		
3	Drive	0 – 127	0 – 127		
4	Output Level	0 – 127	0 – 127	table#18	
5					
6					
7					
8					
9					
10					
11					
12					
13					
14					
15					
16					

LOOP FX1, LOOP FX2, LO-FI, LO-FI DRUM1, LO-FI DRUM2

No.	Parameter	Display	Value	See Table	Control
1	Sampling Freq Control	44.1kHz – 345Hz	0 – 127	table#13	
2	Word Length	1 – 127	1 – 127		
3	Output Gain	-6dB – +36dB	0 – 42		
4	LPF Cutoff	63Hz – 18kHz, Thru	10 – 59, 60	table#3	
5	Filter Type	Thru, PowerBass, Radio, Tel, Clean, Low	0 – 5		

No.	Parameter	Display	Value	See Table	Control
6	LPF Resonance	1.0 – 12.0	10 – 120		
7	Bit Assign	0 – 6	0 – 6		
8	Emphasis	Off, On	0 – 1		
9					
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	●
11					
12					
13					
14					
15	Input Mode	mono, stereo			
16					

LO-FI DRUM3, LO-FI DRUM4

No.	Parameter	Display	Value	See Table	Control
1	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
2	EQ Mid Frequency	100Hz – 16.0kHz	14 – 58	table#3	
3	EQ Mid Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
4	EQ Mid Width	0.1 – 12.0	1 – 120		
5	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
6	EQ Low Frequency	50Hz – 2.0kHz	8 – 40	table#3	
7	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
8					
9					
10					
11					
12					
13					
14					
15	Input Mode	mono, stereo	0 – 1		
16					

DYN FILTER

No.	Parameter	Display	Value	See Table	Control
1	Filter Type	LPF(12dB), LPF(18dB), LPF(24dB), HPF, BPF, BEF	0 – 5		●
2	Sensitivity	0 – 127	0 – 127		●
3	Dyna Level Offset	0 – 127	0 – 127		
4	Resonance	-16 – +111	0 – 127		
5	Attack Time	0.3ms – 227ms	0 – 127	table#20	
6	Release Time	2.6ms – 2171.4ms	0 – 127	table#21	
7	Release Curve	0 – 127	0 – 127		
8	Direction	Up, Down	0 – 1		
9	Dyna Threshold Level	0 – 127	0 – 127		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	
11					
12					
13	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
14	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
15	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
16	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		

DYN RINGMOD

No.	Parameter	Display	Value	See Table	Control
1	Sensitivity	0 – 127	0 – 127		●
2	HPF Cutoff Frequency	Thru, 22Hz – 8.0kHz	0, 1 – 52	table#3	
3	LPF Cutoff Frequency	1.0kHz – 18kHz, Thru	34 – 59, 60	table#3	
4	Attack Time	0.3ms – 227ms	0 – 127	table#20	
5	Release Time	2.6ms – 2171.4ms	0 – 127	table#21	
6	Release Curve	0 – 127	0 – 127		
7	Direction	Up, Down	0 – 1		
8	Dyna Threshold Level	0 – 127	0 – 127		
9	Dyna Level Offset	0 – 127	0 – 127		
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	
11					
12					
13	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	
14	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
15	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
16	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		

RING MOD

No.	Parameter	Display	Value	See Table	Control
1	OSC Frequency Course	0.7Hz – 5kHz	0 – 127	table#22	●
2	OSC Frequency Fine	0 – 127	0 – 127		
3	LFO Wave	Triangle, Sine	0 – 1		
4	LFO Depth	0 – 127	0 – 127	table#19	
5	LFO Freq	0.00Hz – 39.7Hz	0 – 127	table#1	
6	HPF Cutoff Frequency	Thru, 22Hz – 8.0kHz	0, 1 – 52	table#3	
7	LPF Cutoff Frequency	1.0kHz – 18kHz, Thru	34 – 59, 60	table#3	
8					
9					
10	Dry/Wet	D63>W – D=W – D<W63	1 – 64 – 127	table#15	
11					
12					
13	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3	

No.	Parameter	Display	Value	See Table	Control
14	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76		
15	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3	
16	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76		

ISOLATOR

No.	Parameter	Display	Value	See Table	Control
1	On/off SW	Off, On	0 – 1		●
2	Low Level	0 – 127	0 – 127		
3	Mid Level	0 – 127	0 – 127		
4	High Level	0 – 127	0 – 127		
5	Low Mute	Off, On	0 – 1		
6	Mid Mute	Off, On	0 – 1		
7	High Mute	Off, On	0 – 1		
8					
9					
10					
11					
12					
13					
14					
15					
16					

NO EFFECT

NO EFFECT

No.	Parameter	Display	Value	See Table	Control
1					
2					
3					
4					
5					
6					
7					
8					
9					
10					
11					
12					
13					
14					
15					
16					

THRU

THRU

No.	Parameter	Display	Value	See Table	Control
1					
2					
3					
4					
5					
6					
7					
8					
9					
10					
11					
12					
13					
14					
15					
16					

Effect Data Assign Table / Effektdaten-Zuordnungstabelle / Tableau d'assignation des données d'effets

table#1
LFO Frequency

Data	Value	Data	Value	Data	Value	Data	Value
0	0.00	32	1.35	64	2.69	96	8.41
1	0.04	33	1.39	65	2.78	97	8.75
2	0.08	34	1.43	66	2.86	98	9.08
3	0.13	35	1.47	67	2.94	99	9.42
4	0.17	36	1.51	68	3.03	100	9.76
5	0.21	37	1.56	69	3.11	101	10.1
6	0.25	38	1.60	70	3.20	102	10.8
7	0.29	39	1.64	71	3.28	103	11.4
8	0.34	40	1.68	72	3.37	104	12.1
9	0.38	41	1.72	73	3.45	105	12.8
10	0.42	42	1.77	74	3.53	106	13.5
11	0.46	43	1.81	75	3.62	107	14.1
12	0.51	44	1.85	76	3.70	108	14.8
13	0.55	45	1.89	77	3.87	109	15.5
14	0.59	46	1.94	78	4.04	110	16.2
15	0.63	47	1.98	79	4.21	111	16.8
16	0.67	48	2.02	80	4.37	112	17.5
17	0.72	49	2.06	81	4.54	113	18.2
18	0.76	50	2.10	82	4.71	114	19.5
19	0.80	51	2.15	83	4.88	115	20.9
20	0.84	52	2.19	84	5.05	116	22.2
21	0.88	53	2.23	85	5.22	117	23.6
22	0.93	54	2.27	86	5.38	118	24.9
23	0.97	55	2.31	87	5.55	119	26.2
24	1.01	56	2.36	88	5.72	120	27.6
25	1.05	57	2.40	89	6.06	121	28.9
26	1.09	58	2.44	90	6.39	122	30.3
27	1.14	59	2.48	91	6.73	123	31.6
28	1.18	60	2.52	92	7.07	124	33.0
29	1.22	61	2.57	93	7.40	125	34.3
30	1.26	62	2.61	94	7.74	126	37.0
31	1.30	63	2.65	95	8.08	127	39.7

table#4
Reverb time

Data	Value	Data	Value	Data	Value
0	0.3	32	3.5	64	17.0
1	0.4	33	3.6	65	18.0
2	0.5	34	3.7	66	19.0
3	0.6	35	3.8	67	20.0
4	0.7	36	3.9	68	25.0
5	0.8	37	4.0	69	30.0
6	0.9	38	4.1		
7	1.0	39	4.2		
8	1.1	40	4.3		
9	1.2	41	4.4		
10	1.3	42	4.5		
11	1.4	43	4.6		
12	1.5	44	4.7		
13	1.6	45	4.8		
14	1.7	46	4.9		
15	1.8	47	5.0		
16	1.9	48	5.5		
17	2.0	49	6.0		
18	2.1	50	6.5		
19	2.2	51	7.0		
20	2.3	52	7.5		
21	2.4	53	8.0		
22	2.5	54	8.5		
23	2.6	55	9.0		
24	2.7	56	9.5		
25	2.8	57	10.0		
26	2.9	58	11.0		
27	3.0	59	12.0		
28	3.1	60	13.0		
29	3.2	61	14.0		
30	3.3	62	15.0		
31	3.4	63	16.0		

table#7
Delay Time (0.1 – 400.0 [ms])

Data	Value	Data	Value	Data	Value	Data	Value
0	0.1	32	100.9	64	201.6	96	302.4
1	3.2	33	104.0	65	204.8	97	305.5
2	6.4	34	107.2	66	207.9	98	308.7
3	9.5	35	110.3	67	211.1	99	311.8
4	12.7	36	113.5	68	214.2	100	315.0
5	15.8	37	116.6	69	217.4	101	318.1
6	19.0	38	119.8	70	220.5	102	321.3
7	22.1	39	122.9	71	223.7	103	324.4
8	25.3	40	126.1	72	226.8	104	327.6
9	28.4	41	129.2	73	230.0	105	330.7
10	31.6	42	132.4	74	233.1	106	333.9
11	34.7	43	135.5	75	236.3	107	337.0
12	37.9	44	138.6	76	239.4	108	340.2
13	41.0	45	141.8	77	242.6	109	343.3
14	44.2	46	144.9	78	245.7	110	346.5
15	47.3	47	148.1	79	248.9	111	349.6
16	50.5	48	151.2	80	252.0	112	352.8
17	53.6	49	154.4	81	255.2	113	355.9
18	56.8	50	157.5	82	258.3	114	359.1
19	59.9	51	160.7	83	261.5	115	362.2
20	63.1	52	163.8	84	264.6	116	365.4
21	66.2	53	167.0	85	267.7	117	368.5
22	69.4	54	170.1	86	270.9	118	371.7
23	72.5	55	173.3	87	274.0	119	374.8
24	75.7	56	176.4	88	277.2	120	378.0
25	78.8	57	179.6	89	280.3	121	381.1
26	82.0	58	182.7	90	283.5	122	384.3
27	85.1	59	185.9	91	286.6	123	387.4
28	88.3	60	189.0	92	289.8	124	390.6
29	91.4	61	192.2	93	292.9	125	393.7
30	94.6	62	195.3	94	296.1	126	396.9
31	97.7	63	198.5	95	299.2	127	400.0

table#12
Wah Release Time

Data	Value
52	10
53	15
54	25
55	35
56	45
57	55
58	65
59	75
60	85
61	100
62	115
63	140
64	170
65	230
66	340
67	680

table#2
Modulation Delay Offset

Data	Value	Data	Value	Data	Value	Data	Value
0	0.0	32	3.2	64	6.4	96	9.6
1	0.1	33	3.3	65	6.5	97	9.7
2	0.2	34	3.4	66	6.6	98	9.8
3	0.3	35	3.5	67	6.7	99	9.9
4	0.4	36	3.6	68	6.8	100	10.0
5	0.5	37	3.7	69	6.9	101	11.1
6	0.6	38	3.8	70	7.0	102	12.2
7	0.7	39	3.9	71	7.1	103	13.3
8	0.8	40	4.0	72	7.2	104	14.4
9	0.9	41	4.1	73	7.3	105	15.5
10	1.0	42	4.2	74	7.4	106	17.1
11	1.1	43	4.3	75	7.5	107	18.6
12	1.2	44	4.4	76	7.6	108	20.2
13	1.3	45	4.5	77	7.7	109	21.8
14	1.4	46	4.6	78	7.8	110	23.3
15	1.5	47	4.7	79	7.9	111	24.9
16	1.6	48	4.8	80	8.0	112	26.5
17	1.7	49	4.9	81	8.1	113	28.0
18	1.8	50	5.0	82	8.2	114	29.6
19	1.9	51	5.1	83	8.3	115	31.2
20	2.0	52	5.2	84	8.4	116	32.8
21	2.1	53	5.3	85	8.5	117	34.3
22	2.2	54	5.4	86	8.6	118	35.9
23	2.3	55	5.5	87	8.7	119	37.5
24	2.4	56	5.6	88	8.8	120	39.0
25	2.5	57	5.7	89	8.9	121	40.6
26	2.6	58	5.8	90	9.0	122	42.2
27	2.7	59	5.9	91	9.1	123	43.7
28	2.8	60	6.0	92	9.2	124	45.3
29	2.9	61	6.1	93	9.3	125	46.9
30	3.0	62	6.2	94	9.4	126	48.4
31	3.1	63	6.3	95	9.5	127	50.0

table#5
Delay Time (0.1 – 200.0 [ms])

Data	Value	Data	Value	Data	Value	Data	Value
0	0.1	32	50.5	64	100.8	96	151.2
1	1.7	33	52.0	65	102.4	97	152.8
2	3.2	34	53.6	66	104.0	98	154.4
3	4.8	35	55.2	67	105.6	99	155.9
4	6.4	36	56.8	68	107.1	100	157.5
5	8.0	37	58.3	69	108.7	101	159.1
6	9.5	38	59.9	70	110.3	102	160.6
7	11.1	39	61.5	71	111.9	103	162.2
8	12.7	40	63.1	72	113.4	104	163.8
9	14.3	41	64.6	73	115.0	105	165.4
10	15.8	42	66.2	74	116.6	106	166.9
11	17.4	43	67.8	75	118.2	107	168.5
12	19.0	44	69.4	76	119.7	108	170.1
13	20.6	45	70.9	77	121.3	109	171.7
14	22.1	46	72.5	78	122.9	110	173.2
15	23.7	47	74.1	79	124.4	111	174.8
16	25.3	48	75.7	80	126.0	112	176.4
17	26.9	49	77.2	81	127.6	113	178.0
18	28.4	50	78.8	82	129.2	114	179.5
19	30.0	51	80.4	83	130.7	115	181.1
20	31.6	52	81.9	84	132.3	116	182.7
21	33.2	53	83.5	85	133.9	117	184.3
22	34.7	54	85.1	86	135.5	118	185.8
23	36.3	55	86.7	87	137.0	119	187.4
24	37.9	56	88.2	88	138.6	120	189.0
25	39.5	57	89.8	89	140.2	121	190.6
26	41.0	58	91.4	90	141.8	122	192.1
27	42.6	59	93.0	91	143.3	123	193.7
28	44.2	60	94.5	92	144.9	124	195.3
29	45.7	61	96.1	93	146.5	125	196.9
30	47.3	62	97.7	94	148.1	126	198.4
31	48.9	63	99.3	95	149.6	127	200.0

table#8
Compressor Attack Time

Data	Value
0	1
1	2
2	3
3	4
4	5
5	6
6	7
7	8
8	9
9	10
10	12
11	14
12	16
13	18
14	20
15	23
16	26
17	30
18	35
19	40

table#9
Compressor Release Time

Data	Value
0	10
1	15
2	25
3	35
4	45
5	55
6	65
7	75
8	85
9	100
10	115
11	140
12	170
13	230
14	340
15	680

table#10
Compressor Ratio

Data	Value
0	1.0
1	1.5
2	2.0
3	3.0
4	5.0
5	7.0
6	10.0
7	20.0

table#13
LO-FI Sampling Frequency Control

Data	Value	Data	Value	Data	Value	Data	Value
0	44.1k	32	1.34k	64	678.0	96	455.0
1	22.1k	33	1.30k	65	668.0	97	450.0
2	14.7k	34	1.26k	66	658.0	98	445.0
3	11.0k	35	1.23k	67	649.0	99	441.0
4	8.8k	36	1.19k	68	639.0	100	437.0
5	7.4k	37	1.16k	69	630.0	101	432.0
6	6.3k	38	1.13k	70	621.0	102	428.0
7	5.5k	39	1.10k	71	613.0	103	424.0
8	4.9k	40	1.08k	72	604.0	104	420.0
9	4.4k	41	1.05k	73	596.0	105	416.0
10	4.0k	42	1.03k	74	588.0	106	412.0
11	3.7k	43	1.00k	75	580.0	107	408.0
12	3.4k	44	980.0	76	573.0	108	405.0
13	3.2k	45	959.0	77	565.0	109	401.0
14	2.9k	46	938.0	78	558.0	110	397.0
15	2.8k	47	919.0	79	551.0	111	394.0
16	2.6k	48	900.0	80	544.0	112	390.0
17	2.5k	49	882.0	81	538.0	113	387.0
18	2.3k	50	865.0	82	531.0	114	383.0
19	2.2k	51	848.0	83	525.0	115	380.0
20	2.1k	52	832.0	84	519.0	116	377.0
21	2.0k	53	817.0	85	513.0	117	374.0
22	1.92k	54	802.0	86	507.0	118	371.0
23	1.84k	55	788.0	87	501.0	119	368.0
24	1.76k	56	774.0	88	496.0	120	364.0
25	1.70k	57	760.0	89	490.0	121	361.0
26	1.63k	58	747.0	90	485.0	122	359.0
27	1.58k	59	735.0	91	479.0	123	356.0
28	1.52k	60	723.0	92	474.0	124	353.0
29	1.47k	61	711.0	93	469.0	125	350.0
30	1.42k	62	700.0	94	464.0	126	347.0
31	1.38k	63	689.0	95	459.0	127	345.0

table#3
EQ Frequency

Data	Value	Data	Value
0	THRU(20)	32	800
1	22	33	900
2	25	34	1.0k
3	28	35	1.1k
4	32	36	1.2k
5	36	37	1.4k
6	40	38	1.6k
7	45	39	1.8k
8	50	40	2.0k
9	56	41	2.2k
10	63	42	2.5k
11	70	43	2.8k
12	80	44	3.2k
13	90	45	3.6k
14	100	46	4.0k
15	110	47	4.5k
16	125	48	5.0k
17	140	49	5.6k
18	160	50	6.3k
19	180	51	7.0k
20	200	52	8.0k
21	225	53	9.0k
22	250	54	10.0k
23	280	55	11.0k
24	315	56	12.0k
25	355	57	14.0k
26	400	58	16.0k
27	450	59	18.0k
28	500	60	THRU(20.0k)
29	560		
30	630		
31	700		

table#6
Room Size

Data	Value	Data	Value	Data	Value	Data	Value
0	0.1	32	5.1	64	10.1	96	15.1
1	0.3	33	5.3	65	10.3	97	15.3
2	0.4	34	5.4	66	10.4	98	15.5
3	0.6	35	5.6	67	10.6	99	15.6
4	0.7	36	5.7	68	10.8	100	15.8
5	0.9	37	5.9	69	10.9	101	15.9
6	1.0	38	6.1	70	11.1	102	16.1
7	1.2	39	6.2	71	11.2	103	16.2
8	1.4	40	6.4	72	11.4	104	16.4
9	1.5	41	6.5	73	11.5	105	16.6
10	1.7	42	6.7	74	11.7	106	16.7
11	1.8	43	6.8	75	11.9	107	16.9
12	2.0	44	7.0	76	12.0	108	17.0
13	2.1	45	7.2	77	12.2	109	17.2
14	2.3	46	7.3	78	12.3	110	17.3
15	2.5	47	7.5	79	12.5	111	17.5
16	2.6	48	7.6	80	12.6	112	17.6
17	2.8	49	7.8	81	12.8	113	17.8
18	2.9	50	7.9	82	12.9	114	18.0
19	3.1	51	8.1	83	13.1	115	18.1
20	3.2	52	8.2	84	13.3	116	18.3
21	3.4	53	8.4	85	13.4	117	18.4
22	3.5	54	8.6	86	13.6	118	18.6
23	3.7	55	8.7	87	13.7	119	18.7
24	3.9	56	8.9	88	13.9	120	18.9
25	4.0	57	9.0	89	14.0	121	19.1
26	4.2	58	9.2	90	14.2	122	19.2
27	4.3	59	9.3	91	14.4	123	19.4
28	4.5	60	9.5	92	14.5	124	19.5
29	4.6	61	9.7	93	14.7	125	19.7
30	4.8	62	9.8	94	14.8	126	19.8
31	5.0	63	10.0	95	15.0	127	20.0

table#11
Reverb Width; Depth; Height

Data	Value	Data	Value	Data	Value	Data	Value
0	0.5	32	8.8	64	17.6	96	27.5
1	0.8	33	9.1	65	17.9	97	27.8
2	1.0	34	9.4	66	18.2	98	28.1
3	1.3	35	9.6	67	18.5	99	28.5
4	1.5	36	9.9	68	18.8	100	28.8
5	1.8	37	10.2	69	19.1	101	29.2
6	2.0	38	10.4	70	19.4	102	29.5
7	2.3	39	10.7	71	19.7	103	29.9
8	2.6	40	11.0	72	20.0	104	30.2
9	2.8	41	11.2	73	20.2		
10	3.1	42	11.5	74	20.5		
11	3.3	43	11.8	75	20.8		
12	3.6	44	12.1	76	21.1		
13	3.9	45	12.3	77	21.4		
14	4.1	46	12.6	78	21.7		
15	4.4	47	12.9	79	22.0		
16	4.6	48	13.1	80	22.4		
17	4.9	49	13.4	81	22.7		
18	5.2	50	13.7	82	23.0		
19	5.4	51	14.0	83	23.3		
20	5.7	52	14.2	84	23.6		
21	5.9	53	14.5	85	23.9		
22	6.2	54	14.8	86	24.2		
23	6.5	55	15.1	87	24.5		
24	6.7	56	15.4	88	24.9		
25	7.0	57	15.6	89	25.2		
26	7.2	58	15.9	90	25.5		
27	7.5	59	16.2	91	25.8		
28	7.8	60	16.5	92	26.1		
29	8.0	61	16.8	93	26.5		
30	8.3	62	17.1	94	26.8		
31	8.6	63	17.3	95	27.1		

table#14
Tempo

Data	Value	Data	Value	Data	Value
0	64th/3	32	4thX19	64	4thX51
1	64th.	33	4thX20	65	4thX52
2	32th	34	4thX21	66	4thX53
3	32th/3	35	4thX22	67	4thX54
4	32th.	36	4thX23	68	4thX55
5	16th	37	4thX24	69	4thX56
6	16th/3	38	4thX25	70	4thX57
7	16th.	39	4thX26	71	4thX58
8	8th	40	4thX27	72	4thX59
9	8th/3	41	4thX28	73	4thX60
10	8th.	42	4thX29	74	4thX61
11	4th	43	4thX30	75	4thX62
12	4th/3	44	4thX31	76	4thX63
13	4th.	45	4thX32	77	4thX64
14	2nd	46	4thX33		
15	2nd/3	47	4thX34		
16	2nd.	48	4thX35		
17	4thX4	49	4thX36		
18	4thX5	50	4thX37		
19	4thX6	51	4thX38		
20	4thX7	52	4thX39		
21	4thX8	53	4thX40		
22	4thX9	54	4thX41		
23	4thX10	55	4thX42		
24	4thX11	56	4thX43		
25	4thX12	57	4thX44		
26	4thX13	58	4thX45		
27	4thX14	59	4thX46		
28	4thX15	60	4thX47		
29	4thX16	61	4thX48		
30	4thX17	62	4thX49		
31	4thX18	63	4thX50		

table#15
Dry/Wet

Data	Dry (dB)	Wet (dB)	Data	Dry (dB)	Wet (dB)	Data	Dry (dB)	Wet (dB)
1	0.00	-∞	44	0.00	-6.63	87	-7.89	0.00
2	0.00	-71.97	45	0.00	-6.24	88	-8.33	0.00
3	0.00	-59.93	46	0.00	-5.85	89	-8.78	0.00
4	0.00	-52.89	47	0.00	-5.46	90	-9.25	0.00
5	0.00	-47.89	48	0.00	-5.09	91	-9.72	0.00
6	0.00	-44.01	49	0.00	-4.72	92	-10.21	0.00
7	0.00	-40.85	50	0.00	-4.37	93	-10.71	0.00
8	0.00	-38.17	51	0.00	-4.01	94	-11.23	0.00
9	0.00	-35.85	52	0.00	-3.67	95	-11.77	0.00
10	0.00	-33.80	53	0.00	-3.33	96	-12.32	0.00
11	0.00	-31.97	54	0.00	-3.00	97	-12.89	0.00
12	0.00	-30.32	55	0.00	-2.68	98	-13.48	0.00
13	0.00	-28.81	56	0.00	-2.36	99	-14.09	0.00
14	0.00	-27.42	57	0.00	-2.05	100	-14.72	0.00
15	0.00	-26.13	58	0.00	-1.74	101	-15.37	0.00
16	0.00	-24.93	59	0.00	-1.44	102	-16.06	0.00
17	0.00	-23.81	60	0.00	-1.14	103	-16.77	0.00
18	0.00	-22.76	61	0.00	-0.85	104	-17.50	0.00
19	0.00	-21.76	62	0.00	-0.56	105	-18.28	0.00
20	0.00	-20.82	63	0.00	-0.28	106	-19.08	0.00
21	0.00	-19.93	64	0.00	0.00	107	-19.93	0.00
22	0.00	-19.08	65	-0.28	0.00	108	-20.82	0.00
23	0.00	-18.28	66	-0.56	0.00	109	-21.76	0.00
24	0.00	-17.50	67	-0.85	0.00	110	-22.76	0.00
25	0.00	-16.77	68	-1.14	0.00	111	-23.81	0.00
26	0.00	-16.06	69	-1.44	0.00	112	-24.93	0.00
27	0.00	-15.37	70	-1.74	0.00	113	-26.13	0.00
28	0.00	-14.72	71	-2.05	0.00	114	-27.42	0.00
29	0.00	-14.09	72	-2.36	0.00	115	-28.81	0.00
30	0.00	-13.48	73	-2.68	0.00	116	-30.32	0.00
31	0.00	-12.89	74	-3.00	0.00	117	-31.97	0.00
32	0.00	-12.32	75	-3.33	0.00	118	-33.80	0.00
33	0.00	-11.77	76	-3.67	0.00	119	-35.85	0.00
34	0.00	-11.23	77	-4.01	0.00	120	-38.17	0.00
35	0.00	-10.71	78	-4.37	0.00	121	-40.85	0.00
36	0.00	-10.21	79	-4.72	0.00	122	-44.01	0.00
37	0.00	-9.72	80	-5.09	0.00	123	-47.89	0.00
38	0.00	-9.25	81	-5.46	0.00	124	-52.89	0.00
39	0.00	-8.78	82	-5.85	0.00	125	-59.93	0.00
40	0.00	-8.33	83	-6.24	0.00	126	-71.97	0.00
41	0.00	-7.89	84	-6.63	0.00	127	-∞	0.00
42	0.00	-7.46	85	-7.04	0.00			
43	0.00	-7.04	86	-7.46	0.00			

table#16
Feedback Level (Reverb, Delay types, Flanger types)

Data	Value (%)	Data	Value (%)	Data	Value (%)
1	-99.20654297	44	-31.49414063	87	36.21826172
2	-97.63183594	45	-29.91943359	88	37.79296875
3	-96.05712891	46	-28.34472656	89	39.36767578
4	-94.48242188	47	-26.77001953	90	40.94238281
5	-92.90771484	48	-25.1953125	91	42.51708984
6	-91.33300781	49	-23.62060547	92	44.09179688
7	-89.75830078	50	-22.04589844	93	45.66650391
8	-88.18359375	51	-20.47119141	94	47.24121094
9	-86.60888672	52	-18.89648438	95	48.81591797
10	-85.03417969	53	-17.32177734	96	50.390625
11	-83.45947266	54	-15.74707031	97	51.96533203
12	-81.88476563	55	-14.17236328	98	53.54003906
13	-80.31005859	56	-12.59765625	99	55.11474609
14	-78.73535156	57	-11.02294922	100	56.68945313
15	-77.16064453	58	-9.448242188	101	58.26416016
16	-75.5859375	59	-7.873535156	102	59.83886719
17	-74.01123047	60	-6.298828125	103	61.41357422
18	-72.43652344	61	-4.724121094	104	62.98828125
19	-70.86181641	62	-3.149414063	105	64.56298828
20	-69.28710938	63	-1.574707031	106	66.13769531
21	-67.71240234	64	0	107	67.71240234
22	-66.13769531	65	1.574707031	108	69.28710938
23	-64.56298828	66	3.149414063	109	70.86181641
24	-62.98828125	67	4.724121094	110	72.43652344
25	-61.41357422	68	6.298828125	111	74.01123047
26	-59.83886719	69	7.873535156	112	75.5859375
27	-58.26416016	70	9.448242188	113	77.16064453
28	-56.68945313	71	11.02294922	114	78.73535156
29	-55.11474609	72	12.59765625	115	80.31005859
30	-53.54003906	73	14.17236328	116	81.88476563
31	-51.96533203	74	15.74707031	117	83.45947266
32	-50.390625	75	17.32177734	118	85.03417969
33	-48.81591797	76	18.89648438	119	86.60888672
34	-47.24121094	77	20.47119141	120	88.18359375
35	-45.66650391	78	22.04589844	121	89.75830078
36	-44.09179688	79	23.62060547	122	91.33300781
37	-42.51708984	80	25.1953125	123	92.90771484
38	-40.94238281	81	26.77001953	124	94.48242188
39	-39.36767578	82	28.34472656	125	96.05712891
40	-37.79296875	83	29.91943359	126	97.63183594
41	-36.21826172	84	31.49414063	127	99.20654297
42	-34.64355469	85	33.06884766		
43	-33.06884766	86	34.64355469		

table#17
Feedback Level (Chorus types)

Data	Value (%)	Data	Value (%)	Data	Value (%)	Data	Value (%)
1	-72.29	33	-35.57	65	1.15	97	37.87
2	-71.14	34	-34.42	66	2.29	98	39.01
3	-70.00	35	-33.28	67	3.44	99	40.16
4	-68.85	36	-32.13	68	4.59	100	41.31
5	-67.70	37	-30.98	69	5.74	101	42.46
6	-66.55	38	-29.83	70	6.88	102	43.60
7	-65.41	39	-28.69	71	8.03	103	44.75
8	-64.26	40	-27.54	72	9.18	104	45.90
9	-63.11	41	-26.39	73	10.33	105	47.05
10	-61.96	42	-25.24	74	11.47	106	48.19
11	-60.82	43	-24.10	75	12.62	107	49.34
12	-59.67	44	-22.95	76	13.77	108	50.49
13	-58.52	45	-21.80	77	14.92	109	51.64
14	-57.37	46	-20.65	78	16.06	110	52.78
15	-56.23	47	-19.51	79	17.21	111	53.93
16	-55.08	48	-18.36	80	18.36	112	55.08
17	-53.93	49	-17.21	81	19.51	113	56.23
18	-52.78	50	-16.06	82	20.65	114	57.37
19	-51.64	51	-14.92	83	21.80	115	58.52
20	-50.49	52	-13.77	84	22.95	116	59.67
21	-49.34	53	-12.62	85	24.10	117	60.82
22	-48.19	54	-11.47	86	25.24	118	61.96
23	-47.05	55	-10.33	87	26.39	119	63.11
24	-45.90	56	-9.18	88	27.54	120	64.26
25	-44.75	57	-8.03	89	28.69	121	65.41
26	-43.60	58	-6.88	90	29.83	122	66.55
27	-42.46	59	-5.74	91	30.98	123	67.70
28	-41.31	60	-4.59	92	32.13	124	68.85
29	-40.16	61	-3.44	93	33.28	125	70.00
30	-39.01	62	-2.29	94	34.42	126	71.14
31	-37.87	63	-1.15	95	35.57	127	72.29
32	-36.72	64	0.00	96	36.72		

table#18
Level

Data	dB	Data	dB	Data	dB	Data	dB
0	-∞	32	-23.95	64	-11.90	96	-4.86
1	-84.15	33	-23.41	65	-11.64	97	-4.68
2	-72.11	34	-22.89	66	-11.37	98	-4.50
3	-65.07	35	-22.39	67	-11.11	99	-4.33
4	-60.07	36	-21.90	68	-10.85	100	-4.15
5	-56.19	37	-21.42	69	-10.60	101	-3.98
6	-53.03	38	-20.96	70	-10.35	102	-3.81
7	-50.35	39	-20.51	71	-10.10	103	-3.64
8	-48.03	40	-20.07	72	-9.86	104	-3.47
9	-45.98	41	-19.64	73	-9.62	105	-3.30
10	-44.15	42	-19.22	74	-9.38	106	-3.14
11	-42.50	43	-18.81	75	-9.15	107	-2.98
12	-40.98	44	-18.41	76	-8.92	108	-2.82
13	-39.59	45	-18.02	77	-8.69	109	-2.66
14	-38.31	46	-17.64	78	-8.47	110	-2.50
15	-37.11	47	-17.27	79	-8.25	111	-2.34
16	-35.99	48	-16.90	80	-8.03	112	-2.18
17	-34.93	49	-16.54	81	-7.81	113	-2.03
18	-33.94	50	-16.19	82	-7.60	114	-1.88
19	-33.00	51	-15.85	83	-7.39	115	-1.72
20	-32.11	52	-15.51	84	-7.18	116	-1.57
21	-31.26	53	-15.18	85	-6.98	117	-1.42
22	-30.46	54	-14.86	86	-6.77	118	-1.28
23	-29.68	55	-14.54	87	-6.57	119	-1.13
24	-28.94	56	-14.22	88	-6.37	120	-0.98
25	-28.23	57	-13.92	89	-6.18	121	-0.84
26	-27.55	58	-13.62	90	-5.98	122	-0.70
27	-26.90	59	-13.32	91	-5.79	123	-0.56
28	-26.27	60	-13.03	92	-5.60	124	-0.42
29	-25.66	61	-12.74	93	-5.41	125	-0.28
30	-25.07	62	-12.46	94	-5.23	126	-0.14
31	-24.50	63	-12.18	95	-5.04	127	0.00

table#19
LFO Depth

Data	Value (%)	Data	Value (%)	Data	Value (%)	Data	Value (%)
0	0.00	32	25.20	64	50.39	96	75.59
1	0.78	33	25.98	65	51.17	97	76.37
2	1.56	34	26.76	66	51.95	98	77.15
3	2.34	35	27.54	67	52.73	99	77.93
4	3.13	36	28.32	68	53.52	100	78.71
5	3.91	37	29.10	69	54.30	101	79.49
6	4.69	38	29.88	70	55.08	102	80.27
7	5.47	39	30.66	71	55.86	103	81.05
8	6.25	40	31.45	72	56.64	104	81.84
9	7.03	41	32.23	73	57.42	105	82.62
10	7.81	42	33.01	74	58.20	106	83.40
11	8.59	43	33.79	75	58.98	107	84.18
12	9.38	44	34.57	76	59.77	108	84.96
13	10.16	45	35.35	77	60.55	109	85.74
14	10.94	46	36.13	78	61.33	110	86.52
15	11.72	47	36.91	79	62.11	111	87.30
16	12.50	48	37.70	80	62.89	112	88.09
17	13.28	49	38.48	81	63.67	113	88.87
18	14.06	50	39.26	82	64.45	114	89.65
19	14.84	51	40.04	83	65.23	115	90.43
20	15.63	52	40.82	84	66.02	116	91.21
21	16.41	53	41.60	85	66.80	117	91.99
22	17.19	54	42.38	86	67.58	118	92.77
23	17.97	55	43.16	87	68.36	119	93.55
24	18.75	56	43.95	88	69.14	120	94.34
25	19.53	57	44.73	89	69.92	121	95.12
26	20.31	58	45.51	90	70.70	122	95.90
27	21.09	59	46.29	91	71.48	123	96.68
28	21.88	60	47.07	92	72.27	124	97.46
29	22.66	61	47.85	93	73.05	125	98.24
30	23.44	62	48.63	94	73.83	126	99.02
31	24.22	63	49.41	95	74.61	127	100.00

table#20
Dyna Attack Time (ms)

Data	Value	Data	Value	Data	Value	Data	Value
0	0.3	32	54.0	64	112	96	170
1	0.9	33	56.0	65	114	97	172
2	1.8	34	58.0	66	116	98	174
3	2.7	35	60.0	67	118	99	176
4	3.6	36	61.0	68	120	100	178
5	5.4	37	63.0	69	121	101	180
6	7.2	38	65.0	70	123	102	181
7	9.0	39	67.0	71	125	103	183
8	10.0	40	69.0	72	127	104	185
9	12.0	41	70.0	73	129	105	187
10	14.0	42	72.0	74	130	106	189
11	16.0	43	74.0	75	132	107	190
12	18.0	44	76.0	76	134	108	192
13	20.0	45	78.0	77	136	109	194
14	21.0	46	80.0	78	138	110	196
15	23.0	47	81.0	79	140	111	198
16	25.0	48	83.0	80	141	112	200
17	27.0	49	85.0	81	143	113	201
18	29.0	50	87.0	82	145	114	203
19	30.0	51	89.0	83	147	115	205
20	32.0	52	90.0	84	149	116	207
21	34.0	53	92.0	85	150	117	209
22	36.0	54	94.0	86	152	118	210
23	38.0	55	96.0	87	154	119	212
24	40.0	56	98.0	88	156	120	214
25	41.0	57	100.0	89	158	121	216
26	43.0	58	101.0	90	160	122	218
27	45.0	59	103.0	91	161	123	220
28	47.0	60	105.0	92	163	124	221
29	49.0	61	107.0	93	165	125	223
30	50.0	62	109.0	94	167	126	225
31	52.0	63	110.0	95	169	127	227

table#21
Dyna Release Time (ms)

Data	Value	Data	Value	Data	Value	Data	Value
0	2.6	32	86.8	64	369.1	96	1064.0
1	3.0	33	91.2	65	390.8	97	1085.7
2	3.4	34	95.5	66	412.5	98	1107.4
3	3.9	35	99.8	67	434.2	99	1129.1
4	4.3	36	104.2	68	456.0	100	1150.8
5	4.7	37	108.5	69	477.7	101	1172.5
6	5.2	38	112.9	70	499.4	102	1194.3
7	5.6	39	117.2	71	521.1	103	1216.0
8	6.0	40	121.6	72	542.8	104	1237.7
9	6.5	41	125.9	73	564.5	105	1259.4
10	6.9	42	130.2	74	586.2	106	1281.1
11	7.3	43	134.6	75	608.0	107	1302.8
12	7.8	44	138.9	76	629.7	108	1346.3
13	8.2	45	143.3	77	651.4	109	1389.7
14	8.6	46	147.6	78	673.1	110	1433.1
15	13.0	47	152.0	79	694.8	111	1476.6
16	17.3	48	156.3	80	716.5	112	1520.0
17	21.7	49	160.6	81	738.3	113	1563.4
18	26.0	50	165.0	82	760.0	114	1606.8
19	30.4	51	169.3	83	781.7	115	1650.3
20	34.7	52	173.7	84	803.4	116	1693.7
21	39.0	53	178.0	85	825.1	117	1737.1
22	43.4	54	182.4	86	846.8	118	1780.6
23	47.7	55	186.7	87	868.5	119	1824.0
24	52.1	56	195.4	88	890.3	120	1867.4
25	56.4	57	217.1	89	912.0	121	1910.8
26	60.8	58	238.8	90	933.7	122	1954.3
27	65.1	59	260.5	91	955.4	123	1997.7
28	69.4	60	282.2	92	977.1	124	2041.1
29	73.8	61	304.0	93	998.8	125	2084.6
30	78.1	62	325.7	94	1020.5	126	2128.0
31	82.5	63	347.4	95	1042.3	127	2171.4

table#22
Ring Mod Carrier Freq Course (Hz)

Data	Value	Data	Value	Data	Value	Data	Value
0	0.7	32	25.6	64	151.4	96	895.0
1	1.3	33	26.9	65	160.2	97	946.1
2	2.0	34	28.9	66	169.6	98	1000.7
3	2.7	35	30.3	67	179.0	99	1057.2
4	3.4	36	32.3	68	189.1	100	1117.7
5	4.0	37	33.6	69	199.9	101	1181.7
6	4.7	38	35.7	70	211.3	102	1249.0
7	5.4	39	37.7	71	223.4	103	1320.3
8	6.1	40	39.7	72	236.2	104	1395.7
9	6.7	41	42.4	73	249.7	105	1475.1
10	7.4	42	44.4	74	263.8	106	1559.2
11	8.1	43	47.1	75	279.3	107	1648.7
12	8.7	44	49.8	76	294.7	108	1742.9
13	9.4	45	52.5	77	311.6	109	1841.8
14	10.1	46	55.9	78	329.7	110	1947.5
15	10.8	47	59.2	79	348.6	111	2058.5
16	11.4	48	62.6	80	368.1	112	2175.6
17	12.1	49	65.9	81	389.6	113	2300.1
18	12.8	50	70.0	82	411.8	114	2431.3
19	13.5	51	73.3	83	435.4	115	2569.9
20	14.1	52	78.1	84	459.6	116	2716.6
21	14.8	53	82.1	85	485.9	117	2871.4
22	15.5	54	86.8	86	514.1	118	3035.6
23	16.2	55	92.2	87	543.1	119	3208.5
24	16.8	56	96.9	88	574.0	120	3391.6
25	17.5	57	103.0	89	607.0	121	3585.4
26	18.2	58	108.3	90	642.0	122	3790.0
27	19.5	59	115.1	91	678.3	123	4006.6
28	20.9	60	121.1	92	717.3	124	4234.8
29	21.5	61	128.5	93	757.7	125	4477.0
30	22.9	62	135.9	94	801.5	126	4732.1
31	24.2	63	143.3	95	847.2	127	5002.6

table#23
V-Flanger Delay Offset

Data	Value	Data	Value
0	0.1	70	6.4
1	0.1	71	6.7
2	0.1	72	7.0
3	0.2	73	7.4
4	0.2	74	7.7
5	0.2	75	8.1
6	0.2	76	8.5
7	0.2	77	9.0
8	0.3	78	9.4
9	0.3	79	9.9
10	0.3	80	10.3
11	0.3	81	10.7
12	0.4	82	11.2
13	0.4	83	11.6
14	0.4	84	12.1
15	0.4	85	12.5
16	0.4	86	12.9
17	0.5	87	13.4
18	0.5	88	13.8
19	0.5	89	14.2
20	0.5	90	14.7
21	0.6	91	15.1
22	0.6	92	15.6
23	0.6	93	16.0
24	0.7	94	16.4
25	0.7	95	16.9
26	0.7	96	17.3
27	0.8	97	17.8
28	0.8	98	18.2
29	0.8	99	18.6
30	0.9	100	19.1
31	0.9	101	19.5
32	1.0	102	20.0
33	1.0	103	20.4
34	1.1	104	20.8
35	1.1	105	21.3
36	1.2	106	21.7
37	1.2	107	22.2
38	1.3	108	22.6
39	1.4	109	23.0
40	1.4	110	23.5
41	1.5	111	23.9
42	1.6	112	24.4
43	1.7	113	24.8
44	1.8	114	25.2
45	1.8	115	25.7
46	1.9	116	26.1
47	2.0	117	26.5
48	2.1	118	27.0
49	2.3	119	27.4
50	2.4	120	27.9
51	2.5	121	28.3
52	2.6	122	28.7
53	2.7	123	29.2
54	2.9	124	29.6
55	3.0	125	30.1
56	3.2	126	30.5
57	3.3	127	30.9
58	3.5	128	31.4
59	3.7	129	31.8
60	3.9	130	32.3
61	4.1	131	32.7
62	4.3	132	33.1
63	4.5	133	33.6
64	4.7	134	34.0
65	5.0	135	34.5
66	5.2	136	34.9
67	5.5	137	35.3
68	5.8	138	35.8
69	6.0	139	36.2

table#24
Modulation Phase

Data	Value
0	-180
1	-158
2	-135
3	-113
4	-90
5	-68
6	-45
7	-23
8	0
9	23
10	45
11	68
12	90
13	113
14	135
15	158
16	180

table#25
Vintage Flanger Speed

Data	Value	Data	Value	Data	Value
0	0.040	86	0.400	172	2.565
1	0.042	87	0.405	173	2.608
2	0.045	88	0.415	174	2.671
3	0.047	89	0.426	175	2.733
4	0.050	90	0.431	176	2.776
5	0.053	91	0.442	177	2.860
6	0.055	92	0.452	178	2.902
7	0.058	93	0.463	179	2.986
8	0.060	94	0.473	180	3.028
9	0.063	95	0.484	181	3.112
10	0.066	96	0.494	182	3.154
11	0.068	97	0.505	183	3.238
12	0.071	98	0.515	184	3.323
13	0.074	99	0.526	185	3.365
14	0.076	100	0.536	186	3.449
15	0.079	101	0.547	187	3.533
16	0.081	102	0.563	188	3.617
17	0.084	103	0.573	189	3.701
18	0.087	104	0.589	190	3.785
19	0.089	105	0.599	191	3.869
20	0.092	106	0.615	192	3.953
21	0.095	107	0.626	193	4.037
22	0.097	108	0.636	194	4.122
23	0.100	109	0.652	195	4.206
24	0.102	110	0.668	196	4.290
25	0.105	111	0.683	197	4.374
26	0.108	112	0.704	198	4.500
27	0.110	113	0.715	199	4.584
28	0.113	114	0.725	200	4.668
29	0.116	115	0.747	201	4.752
30	0.118	116	0.757	202	4.879
31	0.121	117	0.778	203	5.005
32	0.124	118	0.789	204	5.131
33	0.126	119	0.810	205	5.215
34	0.129	120	0.831	206	5.341
35	0.131	121	0.852	207	5.467
36	0.134	122	0.862	208	5.552
37	0.137	123	0.883	209	5.720
38	0.139	124	0.904	210	5.804
39	0.145	125	0.925	211	5.972
40	0.147	126	0.946	212	6.056
41	0.150	127	0.967	213	6.224
42	0.152	128	0.988	214	6.309
43	0.158	129	1.009	215	6.477
44	0.160	130	1.030	216	6.645
45	0.163	131	1.051	217	6.813
46	0.168	132	1.072	218	6.897
47	0.171	133	1.093	219	7.066
48	0.173	134	1.125	220	7.234
49	0.179	135	1.146	221	7.402
50	0.181	136	1.167	222	7.570
51	0.187	137	1.199	223	7.738
52	0.189	138	1.220	224	7.907
53	0.195	139	1.251	225	8.075
54	0.197	140	1.272	226	8.243
55	0.202	141	1.304	227	8.411
56	0.208	142	1.335	228	8.580
57	0.210	143	1.367	229	8.748
58	0.216	144	1.409	230	9.000
59	0.221	145	1.430	231	9.168
60	0.226	146	1.451	232	9.337
61	0.231	147	1.493	233	9.589
62	0.237	148	1.514	234	9.757
63	0.242	149	1.556	235	10.00
64	0.247	150	1.577		
65	0.252	151	1.619		
66	0.258	152	1.661		
67	0.263	153	1.682		
68	0.268	154	1.724		
69	0.273	155	1.766		
70	0.281	156	1.808		
71	0.287	157	1.851		
72	0.292	158	1.893		
73	0.300	159	1.935		
74	0.308	160	1.977		
75	0.313	161	2.019		
76	0.321	162	2.061		
77	0.326	163	2.103		
78	0.334	164	2.145		
79	0.342	165	2.187		
80	0.347	166	2.250		
81	0.357	167	2.292		
82	0.363	168	2.334		
83	0.373	169	2.397		
84	0.379	170	2.460		
85	0.389	171	2.502		

table#26
Vintage Phaser Speed

Data	Value	Data	Value	Data	Value
0	0.100	86	0.499	172	2.355
1	0.103	87	0.510	173	2.397
2	0.105	88	0.515	174	2.439
3	0.108	89	0.526	175	2.503
4	0.110	90	0.536	176	2.544
5	0.113	91	0.547	177	2.587
6	0.116	92	0.557	178	2.629
7	0.118	93	0.568	179	2.671
8	0.121	94	0.578	180	2.734
9	0.124	95	0.589	181	2.776
10	0.126	96	0.599	182	2.860
11	0.129	97	0.610	183	2.902
12	0.131	98	0.620	184	2.944
13	0.134	99	0.631	185	2.986
14	0.137	100	0.641	186	3.028
15	0.139	101	0.652	187	3.070
16	0.142	102	0.668	188	3.154
17	0.145	103	0.683	189	3.196
18	0.147	104	0.694	190	3.280
19	0.150	105	0.704	191	3.323
20	0.152	106	0.715	192	3.365
21	0.155	107	0.725	193	3.449
22	0.158	108	0.747	194	3.491
23	0.160	109	0.758	195	3.575
24	0.163	110	0.768	196	3.659
25	0.166	111	0.789	197	3.701
26	0.168	112	0.799	198	3.785
27	0.171	113	0.810	199	3.827
28	0.173	114	0.831	200	3.911
29	0.179	115	0.841	201	3.995
30	0.181	116	0.862	202	4.080
31	0.184	117	0.873	203	4.122
32	0.187	118	0.894	204	4.206
33	0.192	119	0.904	205	4.290
34	0.195	120	0.925	206	4.374
35	0.200	121	0.936	207	4.458
36	0.202	122	0.957	208	4.500
37	0.205	123	0.967	209	4.584
38	0.210	124	0.988	210	4.668
39	0.213	125	1.000	211	4.752
40	0.218	126	1.030	212	4.837
41	0.221	127	1.051	213	4.921
42	0.226	128	1.062	214	5.047
43	0.229	129	1.083	215	5.131
44	0.234	130	1.104	216	5.215
45	0.237	131	1.125	217	5.299
46	0.242	132	1.146	218	5.383
47	0.247	133	1.167	219	5.551
48	0.250	134	1.188	220	5.636
49	0.255	135	1.209	221	5.720
50	0.260	136	1.230	222	5.804
51	0.265	137	1.251	223	5.888
52	0.271	138	1.272	224	6.056
53	0.276	139	1.304	225	6.140
54	0.281	140	1.325	226	6.224
55	0.287	141	1.346	227	6.393
56	0.289	142	1.367	228	6.477
57	0.294	143	1.410	229	6.561
58	0.300	144	1.430	230	6.729
59	0.308	145	1.451	231	6.813
60	0.310	146	1.472	232	6.981
61	0.318	147	1.493	233	7.066
62	0.323	148	1.535	234	7.234
63	0.329	149	1.556	235	7.318
64	0.334	150	1.577	236	7.486
65	0.342	151	1.619	237	7.654
66	0.347	152	1.640	238	7.774
67	0.357	153	1.682	239	7.907
68	0.363	154	1.703	240	8.075
69	0.368	155	1.724	241	8.159
70	0.373	156	1.767	242	8.327
71	0.379	157	1.808	243	8.496
72	0.389	158	1.829	244	8.664
73	0.394	159	1.872	245	8.832
74	0.400	160	1.893	246	9.000
75	0.410	161	1.935	247	9.168
76	0.415	162	1.977	248	9.337
77	0.426	163	2.000	249	9.505
78	0.431	164	2.040	250	9.673
79	0.442	165	2.082	251	9.841
80	0.447	166	2.124	252	10.00
81	0.457	167	2.145		
82	0.463	168	2.187		
83	0.473	169	2.229		
84	0.478	170	2.271		
85	0.489	171	2.313		

table#27
Vintage Wah Speed

Data	Value	Data	Value	Data	Value
0	0.100	86	0.610	172	3.659
1	0.103	87	0.620	173	3.701
2	0.105	88	0.636	174	3.785
3	0.108	89	0.652	175	3.869
4	0.110	90	0.662	176	3.953
5	0.113	91	0.673	177	4.037
6	0.116	92	0.694	178	4.122
7	0.118	93	0.704	179	4.206
8	0.121	94	0.725	180	4.290
9	0.124	95	0.736	181	4.374
10	0.126	96	0.747	182	4.500
11	0.129	97	0.768	183	4.584
12	0.131	98	0.778	184	4.668
13	0.134	99	0.799	185	4.795
14	0.137	100	0.820	186	4.879
15	0.139	101	0.831	187	4.963
16	0.142	102	0.852	188	5.090
17	0.145	103	0.873	189	5.173
18	0.147	104	0.883	190	5.299
19	0.152	105	0.904	191	5.383
20	0.155	106	0.935	192	5.552
21	0.157	107	0.946	193	5.636
22	0.163	108	0.967	194	5.720
23	0.166	109	0.988	195	5.888
24	0.168	110	0.999	196	5.972
25	0.173	111	1.020	197	6.140
26	0.176	112	1.051	198	6.224
27	0.179	113	1.072	199	6.393
28	0.184	114	1.093	200	6.477
29	0.187	115	1.115	201	6.665
30	0.189	116	1.136	202	6.813
31	0.195	117	1.157	203	6.897
32	0.200	118	1.188	204	7.066
33	0.202	119	1.209	205	7.234
34	0.208	120	1.241	206	7.402
35	0.210	121	1.262	207	7.570
36	0.216	122	1.293	208	7.654
37	0.221	123	1.314	209	7.823
38	0.226	124	1.346	210	7.991
39	0.231	125	1.367	211	8.159
40	0.234	126	1.409	212	8.327
41	0.239	127	1.430	213	8.496
42	0.244	128	1.451	214	8.748
43	0.250	129	1.493	215	8.916
44	0.255	130	1.514	216	9.084
45	0.260	131	1.556	217	9.253
46	0.265	132	1.598	218	9.505
47	0.271	133	1.619	219	9.673
48	0.276	134	1.661	220	9.841
49	0.284	135	1.703	221	10.09
50	0.289	136	1.724	222	10.26
51	0.294	137	1.766	223	10.51
52	0.302	138	1.808	224	10.77
53	0.308	139	1.851	225	10.93
54	0.315	140	1.872	226	11.10
55	0.321	141	1.914	227	11.44
56	0.326	142	1.956	228	11.61
57	0.334	143	1.999	229	11.94
58	0.342	144	2.040	230	12.11
59	0.347	145	2.082	231	12.45
60	0.357	146	2.124	232	12.62
61	0.363	147	2.166	233	12.95
62	0.368	148	2.229	234	13.29
63	0.379	149	2.250	235	13.46
64	0.384	150	2.313	236	13.79
65	0.394	151	2.355	237	13.96
66	0.405	152	2.397	238	14.30
67	0.410	153	2.460	239	14.64
68	0.421	154	2.502	240	14.97
69	0.426	155	2.566	241	15.31
70	0.436	156	2.608	242	15.65
71	0.447	157	2.671	243	15.98
72	0.457	158	2.734	244	16.32
73	0.463	159	2.776	245	16.65
74	0.473	160	2.818	246	16.99
75	0.484	161	2.902	247	17.33
76	0.494	162	2.944	248	17.66
77	0.505	163	3.028	249	18.00
78	0.515	164	3.070	250	18.34
79	0.526	165	3.154	251	18.84
80	0.536	166	3.196	252	19.18
81	0.547	167	3.280	253	19.51
82	0.563	168	3.336	254	20.00
83	0.573	169	3.407		
84	0.584	170	3.491		
85	0.599	171	3.575		

table#28
Vintage Comp Level

Data	Value	Data	Value	Data	Value
0	-∞dB	67	-28.50dB	134	-10.44dB
1	-138.0dB	68	-28.11dB	135	-10.24dB
2	-120.0dB	69	-27.73dB	136	-10.05dB
3	-109.4dB	70	-27.36dB	137	-9.86dB
4	-101.9dB	71	-26.99dB	138	-9.67dB
5	-96.12dB	72	-26.62dB	139	-9.48dB
6	-91.37dB	73	-26.26dB	140	-9.29dB
7	-87.36dB	74	-25.91dB	141	-9.11dB
8	-83.88dB	75	-25.56dB	142	-8.92dB
9	-80.81dB	76	-25.21dB	143	-8.74dB
10	-78.06dB	77	-24.87dB	144	-8.56dB
11	-75.58dB	78	-24.54dB	145	-8.38dB
12	-73.31dB	79	-24.20dB	146	-8.20dB
13	-71.23dB	80	-23.88dB	147	-8.02dB
14	-69.29dB	81	-23.55dB	148	-7.85dB
15	-67.50dB	82	-23.23dB	149	-7.67dB
16	-65.81dB	83	-22.92dB	150	-7.50dB
17	-64.23dB	84	-22.61dB	151	-7.32dB
18	-62.75dB	85	-22.30dB	152	-7.15dB
19	-61.34dB	86	-21.99dB	153	-6.98dB
20	-60.00dB	87	-21.69dB	154	-6.81dB
21	-58.73dB	88	-21.39dB	155	-6.64dB
22	-57.52dB	89	-21.10dB	156	-6.47dB
23	-56.36dB	90	-20.81dB	157	-6.31dB
24	-55.25dB	91	-20.52dB	158	-6.14dB
25	-54.19dB	92	-20.23dB	159	-5.98dB
26	-53.16dB	93	-19.95dB	160	-5.81dB
27	-52.18dB	94	-19.67dB	161	-5.65dB
28	-51.23dB	95	-19.40dB	162	-5.49dB
29	-50.32dB	96	-19.13dB	163	-5.33dB
30	-49.43dB	97	-18.86dB	164	-5.17dB
31	-48.58dB	98	-18.59dB	165	-5.01dB
32	-47.75dB	99	-18.32dB	166	-4.86dB
33	-46.95dB	100	-18.06dB	167	-4.70dB
34	-46.17dB	101	-17.80dB	168	-4.54dB
35	-45.42dB	102	-17.55dB	169	-4.39dB
36	-44.68dB	103	-17.29dB	170	-4.23dB
37	-43.97dB	104	-17.04dB	171	-4.08dB
38	-43.27dB	105	-16.79dB	172	-3.93dB
39	-42.60dB	106	-16.54dB	173	-3.78dB
40	-41.94dB	107	-16.30dB	174	-3.63dB
41	-41.29dB	108	-16.06dB	175	-3.48dB
42	-40.67dB	109	-15.82dB	176	-3.33dB
43	-40.05dB	110	-15.58dB	177	-3.18dB
44	-39.45dB	111	-15.34dB	178	-3.04dB
45	-38.87dB	112	-15.11dB	179	-2.89dB
46	-38.30dB	113	-14.88dB	180	-2.75dB
47	-37.74dB	114	-14.65dB	181	-2.60dB
48	-37.19dB	115	-14.42dB	182	-2.46dB
49	-36.65dB	116	-14.19dB	183	-2.31dB
50	-36.12dB	117	-13.97dB	184	-2.17dB
51	-35.61dB	118	-13.75dB	185	-2.03dB
52	-35.10dB	119	-13.53dB	186	-1.89dB
53	-34.61dB	120	-13.31dB	187	-1.75dB
54	-34.12dB	121	-13.09dB	188	-1.61dB
55	-33.64dB	122	-12.88dB	189	-1.47dB
56	-33.17dB	123	-12.67dB	190	-1.34dB
57	-32.71dB	124	-12.46dB	191	-1.20dB
58	-32.26dB	125	-12.25dB	192	-1.06dB
59	-31.81dB	126	-12.04dB	193	-0.93dB
60	-31.37dB	127	-11.83dB	194	-0.79dB
61	-30.94dB	128	-11.63dB	195	-0.66dB
62	-30.52dB	129	-11.43dB	196	-0.53dB
63	-30.10dB	130	-11.23dB	197	-0.39dB
64	-29.69dB	131	-11.03dB	198	-0.26dB
65	-29.29dB	132	-10.83dB	199	-0.13dB
66	-28.89dB	133	-10.63dB	200	0.00dB

table#29
Vintage Comp Attack Time

Data	Value	Data	Value	Data	Value
0	0.022ms	67	3.295ms	134	18.53ms
1	0.023ms	68	3.418ms	135	18.88ms
2	0.024ms	69	3.544ms	136	19.23ms
3	0.025ms	70	3.673ms	137	19.59ms
4	0.026ms	71	3.805ms	138	19.95ms
5	0.028ms	72	3.940ms	139	20.31ms
6	0.031ms	73	4.077ms	140	20.68ms
7	0.035ms	74	4.217ms	141	21.05ms
8	0.039ms	75	4.361ms	142	21.42ms
9	0.045ms	76	4.507ms	143	21.80ms
10	0.051ms	77	4.656ms	144	22.18ms
11	0.059ms	78	4.807ms	145	22.57ms
12	0.068ms	79	4.962ms	146	22.96ms
13	0.077ms	80	5.120ms	147	23.36ms
14	0.088ms	81	5.281ms	148	23.75ms
15	0.101ms	82	5.445ms	149	24.16ms
16	0.114ms	83	5.611ms	150	24.56ms
17	0.129ms	84	5.781ms	151	24.97ms
18	0.146ms	85	5.954ms	152	25.39ms
19	0.163ms	86	6.130ms	153	25.81ms
20	0.182ms	87	6.309ms	154	26.23ms
21	0.203ms	88	6.491ms	155	26.66ms
22	0.225ms	89	6.677ms	156	27.09ms
23	0.249ms	90	6.865ms	157	27.53ms
24	0.274ms	91	7.057ms	158	27.97ms
25	0.301ms	92	7.252ms	159	28.41ms
26	0.330ms	93	7.450ms	160	28.86ms
27	0.360ms	94	7.651ms	161	29.31ms
28	0.393ms	95	7.855ms	162	29.77ms
29	0.426ms	96	8.063ms	163	30.23ms
30	0.462ms	97	8.274ms	164	30.70ms
31	0.500ms	98	8.489ms	165	31.17ms
32	0.539ms	99	8.706ms	166	31.64ms
33	0.580ms	100	8.927ms	167	32.12ms
34	0.623ms	101	9.151ms	168	32.60ms
35	0.668ms	102	9.379ms	169	33.09ms
36	0.716ms	103	9.610ms	170	33.58ms
37	0.765ms	104	9.844ms	171	34.07ms
38	0.816ms	105	10.09ms	172	34.57ms
39	0.869ms	106	10.33ms	173	35.08ms
40	0.924ms	107	10.57ms	174	35.59ms
41	0.982ms	108	10.82ms	175	36.10ms
42	1.041ms	109	11.07ms	176	36.62ms
43	1.103ms	110	11.33ms	177	37.14ms
44	1.167ms	111	11.59ms	178	37.67ms
45	1.233ms	112	11.85ms	179	38.20ms
46	1.301ms	113	12.11ms	180	38.73ms
47	1.372ms	114	12.38ms	181	39.27ms
48	1.444ms	115	12.66ms	182	39.82ms
49	1.520ms	116	12.93ms	183	40.36ms
50	1.597ms	117	13.21ms	184	40.92ms
51	1.677ms	118	13.50ms	185	41.48ms
52	1.759ms	119	13.78ms	186	42.04ms
53	1.844ms	120	14.07ms	187	42.61ms
54	1.931ms	121	14.37ms	188	43.18ms
55	2.021ms	122	14.67ms	189	43.75ms
56	2.113ms	123	14.97ms	190	44.33ms
57	2.207ms	124	15.27ms	191	44.92ms
58	2.304ms	125	15.58ms	192	45.51ms
59	2.404ms	126	15.90ms	193	46.10ms
60	2.506ms	127	16.21ms	194	46.70ms
61	2.611ms	128	16.53ms	195	47.31ms
62	2.718ms	129	16.86ms	196	47.91ms
63	2.828ms	130	17.18ms	197	48.53ms
64	2.941ms	131	17.52ms	198	49.15ms
65	3.056ms	132	17.85ms	199	49.77ms
66	3.174ms	133	18.19ms	200	50.40ms

table#30
Vintage Comp Release Time

Data	Value	Data	Value	Data	Value
0	10.88ms	67	70.74ms	134	250.30ms
1	10.90ms	68	72.54ms	135	253.88ms
2	10.94ms	69	74.36ms	136	257.50ms
3	11.00ms	70	76.22ms	137	261.14ms
4	11.10ms	71	78.10ms	138	264.80ms
5	11.22ms	72	80.00ms	139	268.50ms
6	11.36ms	73	81.94ms	140	272.22ms
7	11.54ms	74	83.90ms	141	275.96ms
8	11.74ms	75	85.88ms	142	279.74ms
9	11.96ms	76	87.90ms	143	283.54ms
10	12.22ms	77	89.94ms	144	287.36ms
11	12.50ms	78	92.00ms	145	291.22ms
12	12.80ms	79	94.10ms	146	295.10ms
13	13.14ms	80	96.22ms	147	299.00ms
14	13.50ms	81	98.36ms	148	302.94ms
15	13.88ms	82	100.54ms	149	306.90ms
16	14.30ms	83	102.74ms	150	310.88ms
17	14.74ms	84	104.96ms	151	314.90ms
18	15.20ms	85	107.22ms	152	318.94ms
19	15.70ms	86	109.50ms	153	323.00ms
20	16.22ms	87	111.80ms	154	327.10ms
21	16.76ms	88	114.14ms	155	331.22ms
22	17.34ms	89	116.50ms	156	335.36ms
23	17.94ms	90	118.88ms	157	339.54ms
24	18.56ms	91	121.30ms	158	343.74ms
25	19.22ms	92	123.74ms	159	347.96ms
26	19.90ms	93	126.20ms	160	352.22ms
27	20.60ms	94	128.70ms	161	356.50ms
28	21.34ms	95	131.22ms	162	360.80ms
29	22.10ms	96	133.76ms	163	365.14ms
30	22.88ms	97	136.34ms	164	369.50ms
31	23.70ms	98	138.94ms	165	373.88ms
32	24.54ms	99	141.56ms	166	378.30ms
33	25.40ms	100	144.22ms	167	382.74ms
34	26.30ms	101	146.90ms	168	387.20ms
35	27.22ms	102	149.60ms	169	391.70ms
36	28.16ms	103	152.34ms	170	396.22ms
37	29.14ms	104	155.10ms	171	400.76ms
38	30.14ms	105	157.88ms	172	405.34ms
39	31.16ms	106	160.70ms	173	409.94ms
40	32.22ms	107	163.54ms	174	414.56ms
41	33.30ms	108	166.40ms	175	419.22ms
42	34.40ms	109	169.30ms	176	423.90ms
43	35.54ms	110	172.22ms	177	428.60ms
44	36.70ms	111	175.16ms	178	433.34ms
45	37.88ms	112	178.14ms	179	438.10ms
46	39.10ms	113	181.14ms	180	442.88ms
47	40.34ms	114	184.16ms	181	447.70ms
48	41.60ms	115	187.22ms	182	452.54ms
49	42.90ms	116	190.30ms	183	457.40ms
50	44.22ms	117	193.40ms	184	462.30ms
51	45.56ms	118	196.54ms	185	467.22ms
52	46.94ms	119	199.70ms	186	472.16ms
53	48.34ms	120	202.88ms	187	477.14ms
54	49.76ms	121	206.10ms	188	482.14ms
55	51.22ms	122	209.34ms	189	487.16ms
56	52.70ms	123	212.60ms	190	492.22ms
57	54.20ms	124	215.90ms	191	497.30ms
58	55.74ms	125	219.22ms	192	502.40ms
59	57.30ms	126	222.56ms	193	507.54ms
60	58.88ms	127	225.94ms	194	512.70ms
61	60.50ms	128	229.34ms	195	517.88ms
62	62.14ms	129	232.76ms	196	523.10ms
63	63.80ms	130	236.22ms	197	528.34ms
64	65.50ms	131	239.70ms	198	533.60ms
65	67.22ms	132	243.20ms	199	538.90ms
66	68.96ms	133	246.74ms	200	544.22ms

Vocal Harmony Type List

Category	Type Name	Description	MSB	LSB
Vocal Harmony	StandardDuet	Standard setting for lead vocal plus 1 harmony part. Useful for many music genres.	12	0
	StandardTrio	Standard setting for lead vocal plus 2 harmony parts. Useful for many music genres.	12	1
	StandardQuartet	Standard setting for lead vocal plus 3 harmony parts. Useful for many music genres.	12	2
	StudioVocals	Good for studio productions with suitable EQ setting and less Reverb.	12	33
	JazzyQuartet	Good for Bass, Tenor and Alto singers; for Jazz repertoire. You will hear additional 6th notes.	12	3
	SchlagerTrio	Good for standard Schlager repertoire with simple harmony chords.	12	4
	Destiny'sPop	Good for female singers with lead vocal plus 2 harmony parts above; for female Pop and R&B repertoire.	12	5
	VocalDoubler	Use this preset to overdub your singing in real time. Turn the [VOCAL HARMONY] button on to add harmony parts with Vocal Doubler effect.	12	34
	VocoderVH	Standard vocoder setting; ideal for controlling with "UPPER" part.	12	6
	VocoderMONO	Standard vocoder setting; ideal for controlling with "UPPER" part. You can play mono (single-note) melodies.	12	7
	Rock&Roll	Good for Rock&Roll songs from the 50's and 60's with typical delay sound. Turn the [VOCAL HARMONY] button on to add harmony parts with Blues chords.	12	35
	TempoCross	Tempo Cross Delay on lead vocal. Turn the [VOCAL HARMONY] button on to add harmony parts; good for Pop songs or special show effects.	12	36
	HeavyVoice	Good for Rock and Pop with overdriven vocal. Turn the [VOCAL HARMONY] button on to add Harm.1 with 1 octave down.	12	37
	TelephoneChoir	Typical LoFi vocal ensemble; use as old fashioned ensemble sound or exciting effect in Rock, Pop and Jazz.	12	38
	LikeThe80s	Good for 80's Pop with typical reverb image.	12	39
	Gramophone	Typical 30's vocal ensemble; use as old fashioned gramophone sound.	12	40
	PokerPhaser	Good for modern Pop songs using phaser effect for lead vocal.	12	41
	DetuneVoice	Lead vocal plus two additional detuned harmony parts for exciting detuned sound.	12	8
	PerfectFourth	Quartet singing only perfect fourths; parallel movement of all parts.	12	9
	SingCMajorScale	Sing C major scale and the harmony parts will create suitable chord notes based on the C major scale. You can edit the key root and type by "Harmony Assign" setting.	12	10
	BalladChoir	Good for Ballad backing vocals with long reverb.	12	11
	ChurchChoir	Good for standard church songs and christmas songs with long reverb; recommended for Bass, Tenor and Alto voice.	12	12
	GregorianChoir	Good for rubato Gregorian-chant-type monophonic songs with large reverb; parallel movement of all parts.	12	13
	GospelChoir	Good for Gospel songs with long reverb on harmony parts and minor 7th feel.	12	14
	CosmicChoir	Extreme phasing vocals; useful for exciting effects in Dance and Modern Music.	12	42
	AlpenGirls	Good for male singer with 2 female harmony parts above lead vocal.	12	15
	CountryRock	Typical Country Rock quartet; recommended range is tenor/alto.	12	16
	R&BDiva	Good for female alto singer for R&B repertoire; also useable with Tenor lead vocal.	12	17
	ClosedPopChicks	Good for female singers with two harmony parts below. Change volume of Harm.3 for an additional (3rd) part below.	12	18
	QueenOfPop	Good for Pop and R&B songs using Tempo Delay. Turn the [VOCAL HARMONY] button on to add 2nd Voice.	12	43
	Bob->Mary	Male singer can sound like Female voice with long romantic reverb. Use "BALANCE" on the VOCAL HARMONY EDIT display to add a male duet partner.	12	19
	Mary->Bob	Female singer can sound like Male voice with short reverb. Use "BALANCE" on the VOCAL HARMONY EDIT display to add a female duet partner.	12	20
	FlangingVocals	Useful for modern Pop, Rock and Dance music.	12	44
	JazzySisters	Good for Bass and Tenor Singers. Harmony parts add 3 female Jazz singers.	12	21
	QuartetOnStage	Good for Rock and Pop Music. Harmony parts make up a quartet.	12	22
	DelayedHarmony	Useful in several genres with a tempo-synced delay choir as background.	12	45
	KidsChoir	Want to be a child again? Use this preset type and sing with your friends...	12	23
	ChorusChoir	The chorus effect adds a rich and exciting characteristics to your voice and the harmony parts.	12	46
	BohemianVocode	Tempo flanging Vocoder Type; good for Rock or Pop songs and Intros.	12	47
	RobotVoice	Do you want to sound like a robot? This is the setting. Use Harm.3 for variation.	12	48
	ChordalXG	CHORDAL type setting of previous Vocal Harmony system.	90	0
	DetuneXG	DETUNE type setting of previous Vocal Harmony system.	91	0
	ChromaticXG	CHROMATIC type setting of previous Vocal Harmony system.	92	0
	VocoderXG	VOCODER type setting of previous Vocal Harmony system.	89	0
Synth Vocoder	FatSaw	Fat synth vocoder sound with fat sawtooth wave sound.	13	1
	SimpleSaw	Simple synth vocoder sound with simple sawtooth wave sound.	13	0
	SyncSaw	Sync sound image. You can feel the phaser sound as well.	13	2
	StrongDetune	Strong detuned image.	13	3
	VPPad	Pad oriented synth vocoder sound by VP Pad.	13	4
	ChoirWithYou	Choir oriented synth vocoder. You can hear your own voice as well.	13	5
	Organ	Organ oriented synth vocoder sound.	13	6
	Sweeping	Produces a sweeping sound image.	13	7
	Atmosphere	Pad oriented synth vocoder sound with soft pad sound.	13	8
	AmbientFX	Richly textured sound.	13	9
	Thru	Bypass without any harmonies and effects.	64	0

Chordal Type List

Type Name	Description
2Abv&1Blw.Simple	Harmony based on 3-tone chord, 2 above and 1 below; suitable for backing chorus parts. Basically it generates harmonies within an octave.
1Abv&2Blw.Simple	Harmony based on 3-tone chord, 1 above and 2 below; suitable for backing chorus parts. Basically it generates harmonies within an octave.
1Abv&2Blw.Open	Harmony based on 3 total tones from chords and scales, 1 above and 2 below; it can produce a feeling of movement. Basically it generates open harmonies of an octave or more.
1Abv&2Blw.OpenPara	Harmony based on 3 total tones from chords and scales, 1 above and 2 below; it can produce a feeling of movement. Basically it generates open harmonies of an octave or more. It includes the effect of creating parallel motion of a half tone in certain conditions.
1Abv&2Blw.OpenBlues	Harmony based on 3 total tones from chords and scales, 1 above and 2 below; it can produce a feeling of movement. Basically it generates open harmonies of an octave or more. Since it adds a major second as a scale tone to harmony during 7th chords, it provides a passing tone during 7th chords—suitable for 3-tone chord blues or for country rock in major keys. There are cases where it is not suitable during 7th chord in minor keys.
1Abv&1Blw+UnsD.Simple	Harmony suitable for a trio based on 2-tone chord, 1 above and 1 below (+ Oct. below the input pitch); it is suitable for backing chorus parts.
3Blw.Closed	Harmony based on 3 total tones from chords and scales, 3 below; it can produce a feeling of movement. Basically it generates harmonies within an octave. It is unsuitable for low input pitch, because the harmonies are low.
3Blw.ClosedPara	Harmony based on 3 total tones from chords and scales, 3 below; it can produce a feeling of movement. Basically it generates harmonies within an octave. It is unsuitable for low input pitch, because the harmonies are low. It includes the effect of creating parallel motion of a half tone in certain conditions.
3Blw.ClosedBlues	Harmony based on 3 total tones from chords and scales, 3 below; it can produce a feeling of movement. Basically it generates harmonies within an octave. It is unsuitable for low input pitch, because the harmonies are low. Because it adds the major second as the scale tone to harmony during 7th chord, it provides a passing tone during 7th chords—suitable for 3-tone chord blues in major keys or for country rock. There are cases where it is not suitable during 7th chord in minor keys.
2Blw+Bass.Chordal	Harmony based on 3-tone chord, 2 below and a chord root; it is suited for backing chorus parts.
2Blw+UnsD.Modal	Harmony suitable for a trio based on 2 total tones from chords and scales, 2 below (+ Oct. below the input pitch); it can produce a feeling of movement.
2Blw+UnsD.ModalBlues	Harmony suitable for a trio based on 2 total tones from chords and scales, 2 below (+ Oct. below the input pitch); it can produce a feeling of movement. Because it adds a major second as a scale tone to harmony during 7th chords, it provides a passing tone during 7th chords—suitable for 3-tone chord blues or for country rock in major keys. There are cases where it is not suitable during 7th chord in minor keys.
1Blw+UnsD+Bass	Harmony suitable for a duet based on 1 total tone from chord and scale, the nearby 1 below (+ Oct. below the input pitch and chord root); it can produce a feeling of movement.
1Blw.Far+UnsD+Bass	Harmony suitable for a duet based on 1-tone chord, 1 below, (priority on character) (+ Oct. below the input pitch and chord root). This setting skillfully expresses the chord character.
3Abv.Jazz	Harmony based on 3 total tones from chords and scales, 3 above; it can produce a feeling of movement. Basically it generates harmonies within an octave. It is suitable for low pitched vocals.
3Abv.Chordal	Harmony based on 3-tone chord, 3 above; it is suitable for backing chorus parts. It is also good for low pitched vocals.
3Abv.JazzPara	Harmony based on 3 total tones from chords and scales, 3 above; it handles a major triad as add 6th chord. Because it handles the major second as a scale tone in major triads, it can also provide passing tones. Basically it generates harmonies within an octave. It includes the effect of creating parallel motion of a half tone in certain conditions. It is suitable for low pitched vocals.
3Abv.JazzBluesPara	Harmony based on 3 total tones from chords and scales, 3 above; it handles a major triad as add 6th chord. Since it handles the major second as a scale tone in major triads, it can also provide passing tones. Because it adds a major second as a scale tone to harmony during 7th chords, it provides a passing tone during 7th chords—suitable for 3-tone chord blues or for country rock in major keys. Basically it generates harmonies within an octave. It includes the effect of creating parallel motion of a half tone in certain conditions. There are cases where it is not suitable during 7th chord in minor keys. It is suitable for low pitched vocals.
2Abv&1Blw.WideH	Harmony based on 3 total tones from chords and scales, 2 above and 1 below; it can produce a feeling of movement. Basically it generates open harmonies of an octave or more. It is suitable for low pitched vocals.
2Abv&1Blw.forDuo	Harmony based on 3 total tones from chords and scales, 2 above and 1 below; it can produce a feeling of movement. Because it combines elements suited for duets, HARM. 1, 2 and 3 can be independently selected for use for duets. It can also be used for octave transposing. Basically, the highest tone (HARM.1) is an octave above the lowest tone (HARM.3), and this tone (HARM.1 or HARM.3) handles the major second as the scale tone in major triads. (You should be careful, however, depending on the song.) It is suited for low pitched vocals in situations where all harmonies are used for a quartet.
2Abv&1Blw.Jazz	Harmony based on 3 total tones from chords and scales, 2 above and 1 below; it handles a major triad as add 6th chord. Because it handles the major second as a scale tone in major triads, it can also provide passing tones. Basically, the highest tone (HARM.1) is an octave above the lowest tone (HARM.3). Each of its tones is treated as an element, so it can be used for duets or trios. It is suitable for low pitched vocals.
2Abv&1Blw.WideL	Harmony based on 3 total tones from chords and scales, 2 above and 1 below; it can produce a feeling of movement. Its harmony range tends to be lower than that of Wide H. Basically it generates open harmonies of an octave or more. It is suitable for low pitched vocals.
2Abv+UnsD.Modal6th	Harmony suitable for a trio based on 2 total tones from chords and scales, 2 above (+ Oct. below the input pitch); it handles a major triad as add 6th chord. Because it handles the major second as a scale tone in major triads, it can also provide passing tones. It is suitable for low pitched vocals.
2Abv+Bass.Modal6th	Harmony suitable for a trio based on 2 total tones from chords and scales, 2 above (+ chord root); it handles a major triad as add 6th chord. Because it handles the major second as a scale tone in major triads, it can also provide passing tones. It is suitable for low pitched vocals.
UnsU+1Abv+Bass.Open	Harmony suitable for a duet based on 1 total tone from chord and scale, the nearby 1 above (+ Oct. below the input pitch and chord root); it can produce a feeling of movement.
1Abv&2Blw.Jazz	Harmony based on 3 total tones from chords and scales, 1 above and 2 below; it can produce a feeling of movement. Because it handles the major second as a scale tone in major triads, it can also provide passing tones. Basically it is a closed harmony within an octave.
1Abv&2Blw.80s	Harmony based on 3 total tones from chords and scales, 1 above and 2 below; it can produce a feeling of movement. Because it handles the major second as a scale tone in major triads, it can also provide passing tone. With priority on the chord’s character, it is good for broadening the sound in which Maj7 and m7 chords are often used. Basically it generates closed harmonies within an octave.
1Abv&2Blw.Blues	Harmony based on 3 total tones from chords and scales, 1 above and 2 below; it can produce a feeling of movement. Since it handles the major second as a scale tone in major triads, it can also provide passing tones. Because it adds the major second as a scale tone to harmony during 7th chords, it provides a passing tone during 7th chords—suitable for 3-tone chord blues in major keys or for country rock. Basically it generates closed harmonies within an octave.
1Abv&2Blw.ChordalBlues	Harmony based on 3 total tones from chords and scales, 1 above and 2 below; it can produce a feeling of movement. Because it handles the major second as a scale tone in major triads, it can also provide passing tones. Because it adds the major second as a scale tone to harmony during 7th chords, it provides a passing tone during 7th chords—suitable for 3-tone chord blues in major keys or for country rock. With priority on the chord’s character, it is good for broadening the sound in which Maj7 and m7 chords are often used. Basically it generates closed harmonies within an octave.
1Abv&2Blw.Chordal	Harmony based on tone chords and scale tones used as duet, 1 above and 2 below; it can produce a feeling of movement. HARM.1 is a tone above and nearest the input pitch. HARM.2, tone which is below the input pitch and nearest the input pitch, handles a major triad as add 6th chord. HARM.3 is harmony with priority on the chord character of the lower notes. Because it handles the major second as a scale tone in major triads, it can also provide passing tones.
1Abv&2Blw.Wide	Harmony based on 3 total tones from chords and scales, 1 above and 2 below; it can produce a feeling of movement. It handles a major triad as add 6th chord. Since it handles the major second as a scale tone, it can also provide passing tones. Basically it generates open harmonies of an octave or more.
1Abv&2Blw.WideBlues	Harmony based on 3 total tones from chords and scales, 1 above and 2 below; it can produce a feeling of movement. Since it handles a major triad as add 6th chord, and handles the major second as a scale tone, it can also provide passing tones. Because it adds the major second as a scale tone to harmony during 7th chords, it provides a passing tone during 7th chords—suitable for 3-tone chord in major keys or for country rock. Basically it generates open harmonies of an octave or more.
1Abv&1Blw+Bass	Harmony based on tone chords and scale tones used as duet, 1 above and 1 below; (+ chord root); it can produce a feeling of movement. HARM.1 is a tone above and nearest the input pitch. HARM.2, tone which is below the input pitch and nearest the input pitch, handles a major triad as add 6th chord, and since it handles the major second as a scale tone in major triads, it can provide passing tones.
1Abv&1Blw+UnsD.Modal6th	Harmony suitable for a trio based on 2 total tones from chords and scales, a above and below (+ Oct. below the input pitch); it can produce a feeling of movement. Because it handles a major triad as add 6th chord, and handles the major second as a scale tone, it can provide passing tones.
1Abv&1Blw+Bass.Modal6th	Harmony based on tone chords and scale tones used as duet, 1 above and 1 below (+ chord root); it can produce a feeling of movement. HARM.1 is harmony of above tone with priority on the chord character. HARM.2, harmony near the below side, handles a major triad as add 6th chord, and since it handles the major second as a scale tone, it can provide passing tones. Because it handles the major second as a scale tone in major triads, it can also provide passing tones.
3Blw.Jazz	Harmony based on 3 total tones from chords and scales, 3 below; it handles a major triad as add 6th chord. Because it handles the major second as a scale tone in major triads, it can also provide passing tones. Basically it generates harmonies within an octave. It is suitable for high pitched vocals.
3Blw.JazzBlues	Harmony based on 3 total tones from chords and scales, 3 below; it handles a major triad as add 6th chord. Because it handles the major second as a scale tone in major triads, it can also provide passing tones. Because it adds the major second as a scale tone to harmony during 7th chords, it provides a passing tone during 7th chords—suitable for 3-tone chord blues or for country rock in major keys. Basically it generates harmonies within an octave. It is suitable for high pitched vocals.
2Blw+UnsD.Modal6th	Harmony suitable for a trio based on 2 total tones from chords and scales, 2 below (+ Oct. below input pitch); it handles a major triad as add 6th chord. Because it handles the major second as a scale tone in major triads, it can also provide passing tones. Basically it generates harmonies within an octave. It is suitable for high pitched vocals.
2Blw+Bass.Modal6th	Harmony suitable for a trio based on 2 total tones from chords and scales, 2 below (+ chord root); it handles a major triad as add 6th chord. Because it handles the major second as a scale tone in major triads, it can also provide passing tones. Basically it generates harmonies within an octave. It is suitable for high pitched vocals.

Type Name	Description
ScaleDiatonic	This generates harmonies based on the scale specified by the KEY ROOT/TYPE value and the degree specified by the DEGREE value. The harmonies are not dependent on a chord. If there are many notes, the chord feeling intensifies, so it is suitable for use as duets, fixed at a third above. This setting is good for modal church music or modal jazz.
Parallel	This can reproduce harmonies for which semitone pitches are fixed 4th build or diminished sounds, for example. This setting is good, for example, in modal jazz scales (when you want to eliminate chordal feeling) or in progressive music.

Vocal Effect Type List

Type Name		Description	MSB	LSB
ROMANTIC REV	(Romantic Reverb)	Long reverb for vocal part. Romantic image.	1	0
80sPOP REV	(80s'Pop Reverb)	Long reverb for vocal part. 80's pop image.	1	16
ROOM		Reverb simulating the acoustics of a room.	2	0
STAGE	(Concert Stage)	Reverb simulating the concert stage.	3	0
PLATE		Reverb simulating a plate reverb unit.	4	0
VCL DOUBLE	(Vocal Doubler)	Immediate delay with center focused feeling.	5	16
SPREAD	(Stereo Spread)	Immediate delay with spread feeling.	5	17
DELAY		Produces simple delayed sounds: L,R, and C (center).	5	0
SHORT DELAY		Produces short delayed sound with narrow image.	5	1
R&R DELAY	(Rock&Roll Delay)	Produces slap back echo sound. Good for Rock&Roll music.	5	18
CROSS DELAY		The feedback of the two delayed sounds is crossed.	8	0
TEMPO DELAY		Tempo-synchronized delay.	21	0
TEMPO CROSS	(Tempo Cross Delay)	Tempo-synchronized cross delay.	22	0
CHORUS	(Chorus)	Conventional chorus program with rich, warm chorusing.	66	0
EQ HI-FI		Equalizer effect that boosts both high and low frequencies.	76	16
EQ TEL		Equalizer effect that cuts both high and low frequencies.	76	0
GRAMOPHONE		Produces Lo-Fi sound with gramophone image.	94	0
ROBOT		Produces Lo-Fi sound with robotic image.	94	16
OVERDRIVEN		Produces overdriven sound. Good for rock and dance music.	98	0
SCREAM&SHOUT		Produces heavy distorted sound.	98	16
TEMPO FLANGE	(Tempo Flanger)	Tempo-synchronized flanger.	107	0
TEMPO PHASER		Tempo-synchronized phaser.	108	0
TEMPO A.PAN	(Tempo Auto Pan)	Tempo-synchronized auto pan.	121	0
NO EFFECT		No effect.	0	0

Harmony Assign Parameters

Parameter	Value	Description
TRANS.MODE *These are effective only when Vocoder or Vocoder-Mono is selected in Mode.	0	Assigns the harmony to the octave range centered around the pitch of the played note.
	Auto	Assigns the harmony to the same octave range as the vocal (microphone) input.
	-3	Assigns the harmony to a range roughly 3 octaves below the pitch of the played note.
	-2	Assigns the harmony to a range roughly 2 octaves below the pitch of the played note.
	-1	Assigns the harmony to a range roughly 1 octave below the pitch of the played note.
	+1	Assigns the harmony to a range roughly 1 octave above the pitch of the played note.
	+2	Assigns the harmony to a range roughly 2 octaves above the pitch of the played note.
	+3	Assigns the harmony to a range roughly 3 octaves above the pitch of the played note.
SESSION TABLE *These are effective only when a Chordal Type other than Scale Diatonic or Parallel is selected.	Normal	The chord designation is used as shown. This is for general use in conventional music genres.
	Simple	Tends to add a simpler harmony. Use this when you need simple accompaniment.
	R&R	Tends to add harmony with a strong major 6th in both major and minor triads. This is good with rock 'n' roll music.
	UrbanA	Tends to add harmony with a strong major 6th to the major triad and a minor 7th to the minor triad. This is good for a sophisticated, urban feel.
	UrbanB	Tends to add harmony with a strong major 7th to the major triad and a minor 7th to the minor triad. This is good for a sophisticated, urban feel.
	Blues7	Tends to add harmony with a strong minor 7th. This is good for blues music.
	UrbanC	Tends to add harmony with a strong major 9th to both the major and minor triads. This is good for a sophisticated, urban feel.
KEY ROOT *These are effective only When the Chordal Type parameter is set to ScaleDiatonic.		Determines the root key for the transposition. Refer to the Reference Manual.
KEY TYPE *These are effective only When the Chordal Type parameter is set to ScaleDiatonic.		Determines the scale type for the transposition. Refer to the Reference Manual.

Vocal Effect Parameter List

ROMANTIC REV, 80sPOP REV, ROOM, STAGE, PLATE

No.	Parameter	Display	Value	See Table
1	Reverb Time	0.3s – 30.0s	0 – 69	table#4
2	Diffusion	0 – 10	0 – 10	
3	Initial Delay	0.1ms – 99.3ms	0 – 63	
4	HPF Cutoff	Thru, 22Hz – 8.0kHz	0, 1 – 52	table#3
5	LPF Cutoff	1.0kHz – 18kHz, Thru	34 – 59, 60	table#3
6				
7				
8				
9				
10				
11	Rev Delay	0.1ms – 99.3ms	0 – 63	
12	Density	0 – 4	0 – 4	
13	Er/Rev Balance	E63>R – E=R – E<R63	1 – 64 – 127	
14	High Damp	0.1 – 1.0	1 – 10	
15	Feedback Level	-63 – 0 – + 63	1 – 64 – 127	(table#16)
16				

VCL DOUBLE, SPREAD, DELAY, SHORT DELAY, R&R DELAY

No.	Parameter	Display	Value	See Table
1	Lch Delay	0.1ms – 1486.0ms	1 – 14860	
2	Rch Delay	0.1ms – 1486.0ms	1 – 14860	
3	Cch Delay	0.1ms – 1486.0ms	1 – 14860	
4	Feedback Delay	0.1ms – 1486.0ms	1 – 14860	
5	Feedback Level	-63 – 0 – + 63	1 – 64 – 127	(table#16)
6	Cch Level	0 – 127	0 – 127	(table#18)
7	High Damp	0.1 – 1.0	1 – 10	
8				
9				
10				
11				
12				
13	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3
14	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76	
15	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3
16	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76	

CROSS DELAY

No.	Parameter	Display	Value	See Table
1	L->R Delay	0.1ms – 743.0ms	1 – 7430	
2	R->L Delay	0.1ms – 743.0ms	1 – 7430	
3	Feedback Level	-63 – 0 – + 63	1 – 64 – 127	(table#16)
4	Input Select	L, R, L&R	0 – 2	
5	High Damp	0.1 – 1.0	1 – 10	
6				
7				
8				
9				
10				
11				
12				
13	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3
14	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76	
15	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3
16	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76	

TEMPO DELAY

No.	Parameter	Display	Value	See Table
1	Delay Time	64th/3 – 4thx6	0 – 19	table#14
2	Feedback Level	-63 – 0 – + 63	1 – 64 – 127	(table#16)
3	Feedback High Dump	0.1 – 1.0	1 – 10	
4	L/R Diffusion	-63ms – 0ms – 63ms	1 – 64 – 127	
5	Lag	-63ms – 0ms – 63ms	1 – 64 – 127	
6				
7				
8				
9				
10				
11				
12				
13	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	
14	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76	
15	EQ High Frequency	500Hz – 16.0kHz	28 – 58	
16	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76	

TEMPO CROSS

No.	Parameter	Display	Value	See Table
1	Delay Time L>R	64th/3 – 4thx6	0 – 19	table#14
2	Delay Time R>L	64th/3 – 4thx6	0 – 19	table#14
3	Feedback Level	-63 – 0 – + 63	1 – 64 – 127	(table#16)
4	Input Select	L, R, L&R	0 – 2	
5	Feedback High Dump	0.1 – 1.0	1 – 10	
6	Lag	-63ms – 0ms – 63ms	1 – 64 – 127	
7				
8				
9				
10				
11				
12				
13	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	
14	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76	
15	EQ High Frequency	500Hz – 16.0kHz	28 – 58	
16	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76	

CHORUS

No.	Parameter	Display	Value	See Table
1	LFO Frequency	0.00Hz – 39.7Hz	0 – 127	table#1
2	LFO Depth	0 – 127	0 – 127	(table#19)
3	Feedback Level	-63 – 0 – + 63	1 – 64 – 127	(table#17)
4	Delay Offset	0.0ms – 50ms	0 – 127	table#2
5				
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76	
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76	
10				
11	EQ Mid Frequency	100Hz – 10.0kHz	14 – 54	table#3
12	EQ Mid Gain	-12dB – 0dB – +12dB	52 – 64 – 76	
13	EQ Mid Width	0.1 – 12.0	1 – 120	
14				
15	Input Mode	mono, stereo	0 – 1	
16				

EQ HI-FI, EQ TEL

No.	Parameter	Display	Value	See Table
1	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76	
2	EQ Mid Frequency	100Hz – 16.0kHz	14 – 58	table#3
3	EQ Mid Gain	-12dB – 0dB – +12dB	52 – 64 – 76	
4	EQ Mid Width	0.1 – 12.0	1 – 120	
5	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76	
6	EQ Low Frequency	50Hz – 2.0kHz	8 – 40	table#3
7	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3
8				
9				
10				
11				
12				
13				
14				
15	Input Mode	mono, stereo	0 – 1	
16				

GRAMOPHONE, ROBOT

No.	Parameter	Display	Value	See Table
1	Sampling Freq Control	345Hz – 44.1kHz	0 – 127	table#13
2	Word Length	1 – 127	1 – 127	
3	Output Gain	-6dB – +6dB	0 – 12	
4	LPF Cutoff	63Hz – 18kHz, Thru	10 – 59, 60	table#3
5	Filter Type	Thru, PowerBass, Radio, Tel, Clean, Low	0 – 5	
6	LPF Resonance	1.0 – 12.0	10 – 120	
7	Bit Assign	0 – 6	0 – 6	
8	Emphasis	Off, On	0 – 1	
9				
10				
11				
12				
13				
14				
15	Input Mode	mono, stereo		
16				

OVERDRIVEN, SCREAM&SHOUT

No.	Parameter	Display	Value	See Table
1	Overdrive	0% – 100%	0 – 100	
2	Device	Transistor, Vintage Tube, Dist1, Dist2, Fuzz	0 – 4	
3	Speaker	Flat, Stack, Combo, Twin, Radio, Megaphone	0 – 5	
4	Presence	0 – 20	0 – 20	
5	Output Level	0% – 100%	0 – 100	
6				
7				
8				
9				
10				
11				
12				
13				
14				
15				

No.	Parameter	Display	Value	See Table
16				

TEMPO FLANGE

No.	Parameter	Display	Value	See Table
1	LFO Freq	16th – 4thx16	5 – 29	table#14
2	LFO Depth	0 – 127	0 – 127	(table#19)
3	Feedback Level	-63 – 0 – + 63	1 – 64 – 127	(table#17)
4	Delay Offset	0.0ms – 50ms	0 – 127	table#2
5				
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76	
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76	
10				
11	EQ mid frequency	100Hz – 10.0kHz	14 – 54	table#3
12	EQ mid gain	-12dB – 0dB – +12dB	52 – 64 – 76	
13	EQ mid width	0.1 – 12.0	1 – 120	
14	LFO phase difference	-180deg – 0deg – +180deg	4 – 64 – 124	
15				
16				

TEMPO PHASER

No.	Parameter	Display	Value	See Table
1	LFO Freq	16th – 4thx16	5 – 29	table#14
2	LFO Depth	0 – 127	0 – 127	(table#19)
3	Phase Shift Offset	0 – 127	0 – 127	
4	Feedback Level	-63 – 0 – + 63	1 – 64 – 127	(table#16)
5				
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76	
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76	
10				
11	Stage	3 – 11	3 – 11	
12				
13	LFO phase difference	-180deg – 0deg – +180deg	4 – 64 – 124	
14				
15				
16				

TEMPO A.PAN

No.	Parameter	Display	Value	See Table
1	LFO Freq	16th – 4thx16	5 – 29	table#14
2	L/R Depth	0 – 127	0 – 127	
3	F/R Depth	0 – 127	0 – 127	
4	PAN Direction	L<->R, L->R, L<-R, Lturn, Rturn, L/R	0 – 5	
5	LFO Wave	0 – 28	0 – 28	
6	EQ Low Frequency	32Hz – 2.0kHz	4 – 40	table#3
7	EQ Low Gain	-12dB – 0dB – +12dB	52 – 64 – 76	
8	EQ High Frequency	500Hz – 16.0kHz	28 – 58	table#3
9	EQ High Gain	-12dB – 0dB – +12dB	52 – 64 – 76	
10				
11	EQ Mid Frequency	100Hz – 10.0kHz	14 – 54	table#3
12	EQ Mid Gain	-12dB – 0dB – +12dB	52 – 64 – 76	
13	EQ Mid Width	0.1 – 12.0	1 – 120	
14				
15	Input Mode	mono, stereo	0 – 1	
16				

NO EFFECT

No.	Parameter	Display	Value	See Table
1				
2				
3				
4				
5				
6				
7				
8				
9				
10				
11				
12				
13				
14				
15				
16				

Pitch Correct Parameters

Parameter	Description
OFF	The input sound is not pitch corrected. Since the harmony has a more natural sound, this setting is good for duets, etc.
SOFT1	The input sound is almost without pitch correction. Since the pitches of the harmony are more accurate, this setting is good for backing chorus parts, etc.
SOFT2	The input sound is slightly pitch corrected. Since the harmony has a more natural sound, this setting is good for duets, etc.
HARD	The input sound is pitch corrected. Since the pitches of the harmony are more accurate, this setting is good for backing chorus parts, etc.

Vocal Harmony Edit (Detail) Parameters

Parameter	Value	Description
LEAD PITCH DETECT SPEED/ HARM. PITCH DETECT SPEED	15(Fast)	This setting responds even more quickly to pitch changes, and even if the vocal is slightly off pitch, the harmony easily follows; however, sensitivity is high.
	14	This setting responds even more quickly to pitch changes, and sensitivity of pitch detection is slightly high.
	13	This setting responds quickly to pitch changes, and sensitivity of pitch detection is slightly high.
	12	This setting responds a little quickly to pitch changes, and sensitivity of pitch detection is slightly high.
	11	This setting responds a little quickly to pitch changes, and sensitivity of pitch detection is slightly low.
	10	This setting responds a little quickly to pitch changes, and pitch detection is moderately precise.
	9	This setting responds fairly quickly to pitch changes, and even if the vocal is slightly off pitch, the harmony easily follows.
	8	This setting responds a little quickly to pitch changes, and sensitivity of pitch detection is slightly high.
	7	This setting responds a little quickly to pitch changes, and sensitivity of pitch detection is slightly low.
	6	This setting responds a little quickly to pitch changes, and pitch detection is moderately precise.
	5	This setting responds a little quickly to pitch changes, and even if the vocal is slightly off pitch, the harmony easily follows.
	4(Normal)	This setting responds relatively quickly to pitch changes, and pitch detection is moderately precise.
	3	This setting responds relatively quickly to pitch changes, and even if the vocal is slightly off pitch, the harmony easily follows.
	2	This setting responds relatively slowly to pitch changes, and even if the vocal is slightly off pitch, the harmony easily follows.
	1(Slow)	This setting responds most slowly to pitch changes, and even if the vocal is slightly off pitch, the harmony easily follows.
	as Mic Setting	This setting gives priority to the speed which is set on the VOCAL page of the MIC SETTING display.
HARMONY EFFECT	Cmp&EQ Solid	This compresses strong peaks and consonant sounds, etc.
	Cmp&EQ Wide	This is a well-balanced EQ setting covering a wide range. It also compress strong peaks for a narrower dynamic range.
	Cmp&EQ Mid	An EQ setting which emphasizes the mid range, it also compresses strong peaks for a narrower dynamic range.
	Cmp&EQ Lite	This EQ setting has a light feel, while emphasizing the bass range. It also compresses strong peaks for a narrower dynamic range.
	Cmp&EQ Heavy	This EQ setting has a heavy feel. It also uses compresses strong peaks for a narrower dynamic range.
	Cmp&EQ HiLo	This EQ setting emphasizes the treble and bass ranges. It also compresses strong peaks for a narrower dynamic range.
	Cmp&EQ Hi	This EQ setting emphasizes the treble range. It also compresses strong peaks for a narrower dynamic range.
	Cmp	This compresses strong peaks for a narrower dynamic range.
	EQ Wide	This is a well-balanced EQ setting which covers a wide spectrum range.
	EQ Mid	This EQ setting emphasizes the mid range.
	EQ Lite	This EQ setting has a light feeling, while emphasizing the bass range.
	EQ Heavy	This EQ setting has a heavy feeling.
	EQ HiLo	This EQ setting emphasizes the treble and bass ranges.
	EQ Hi	This EQ setting emphasizes the treble range.
	Female Lite	This setting is suited for female vocalists. It attenuates the bass range and provides a light image.
	Female	This setting is suited for female vocalists.
	Lite	This setting is suited for male vocalists. It attenuates the bass range and provides a light image.
	Basic	This setting is suited for male vocalists.
	Thru	This is a bypass setting. It has no harmony effect.
HARMONY STABILITY	Stable	This has a relatively stable sound with little harmony motion.
	Dynamic	This tends to add harmony with motion according to the input sound.
LEAD VIBRATO DEPTH	This specifies the vibrato depth of the lead sound.	
HARM. VIBRATO DEPTH	This specifies the vibrato depth of the harmony sound.	
VIBRATO SPEED	It specifies the vibrato speed of both the lead and harmony sounds.	
VIBRATO DELAY	It specifies the vibrato delay of both the lead and harmony sounds.	

Parameter	System				Voice Set	Voice Set Group	Song		Style		Multi Pad	Registration		Parameter Lock Group	Note
	SetUp	MIDI Setup	User Effect	Music Finder			Song	Song Setup Group	Style Data	OTS		Regist	Freeze Group		
Main															
SongFile	X	X	X	X	X	-	X	-	X	X	X	O	Song	-	
StyleFile	X	X	X	O	X	-	X	-	X	X	X	O	Style	-	
MultiPad File	X	X	X	X	X	-	X	-	X	O	X	O	MultiPad	-	
Right1 VoiceFile	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Right2 VoiceFile	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Right3 VoiceFile	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Left VoiceFile	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
PartSelect	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
PartOn/Off (Right1)	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	Voice	-	
PartOn/Off (Right2)	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	Voice	-	
PartOn/Off (Right3)	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	Voice	-	
PartOn/Off (Left)	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	Style	-	
RegistrationBankFile	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
File System															
CharacterSelect	X	X	X	X	X	-	X	-	X	X	X	X	-	-	One setting for all the Name related pop-up window.
File Selection display															
Select View Setup	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Song Path															
Song Folder Path	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Style Path															
Style Folder Path	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
FILE ACCESS SW	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Song															
Synchro Start	X	X	X	X	X	-	X	-	X	X	X	O	Song	-	
StartStop	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Channel On/Off	X	X	X	X	X	-	X	-	X	X	X	O	Song	-	
Menu > Function > SongSetting															
Guide Mode	O	X	X	X	X	-	O	Guide Setting	X	X	X	X	-	-	When there is no Guide Mode information in the Song data, it returns to the default setting.
Repeat Mode	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Repeat Directory	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Phrase Mark Repeat	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Right Channel	O	X	X	X	X	-	O	(Set by recording)	X	X	X	X	-	-	
Left Channel	O	X	X	X	X	-	O	(Set by recording)	X	X	X	X	-	-	
Auto Ch Set	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Lyrics Language	O	X	X	X	X	-	O	Lyrics Setting	X	X	X	X	-	-	
QuickStart	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
PAT On/Off	X	X	X	X	X	-	X	-	X	X	X	X	-	-	Set to OFF when a song is selected. Set to ON if the selected song has Sys Ex messages at the beginning of the data.
Guide On/Off	X	X	X	X	X	-	X	-	X	X	X	X	-	-	Set to OFF when a song is selected. Set to ON if the selected song has Sys Ex messages at the beginning of the data.
Tempo															
Master Tempo	X	X	X	X	X	-	O	TEMPO	O	X	X	O	Tempo	-	
Menu > DigitalRecording > Song Creator															
REC Mode															
Rec Start	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
PunchInAt	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Rec End	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
PunchOutAt	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Pedal Punch In/Out	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Channel > Quantize															
Channel	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Size	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Strength	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Channel > Track Delete															
Track Delete	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Channel > Track Mix															
Source1	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Source2	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Destination	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Channel > Channel Transpose															
Channel Transpose	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Channel > Setup															
Setup Select	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Chd/1–16/SysEx./Lyric > Filter															
Main Filter	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Control Change Filter	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Style Filter	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Lyric/Text															
BackGround (Panel Setting)	O	X	X	X	X	-	O	Lyrics Setting	X	X	X	X	-	-	Cannot be reset with Factory Reset.
Back Ground (Song Setting)	X	X	X	X	X	-	O	Lyrics Setting	X	X	X	X	-	-	Reset to the background selected last via the panel operation with Factory Reset.
Viewer Mode	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Text File (Panel Setting)	X	X	X	X	X	-	X	-	X	X	X	O	Text	-	
Text Sw															
Text Size	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Score Sw															
Left on/off	O	X	X	X	X	-	O	Score Setting	X	X	X	X	-	-	
Right on/off	O	X	X	X	X	-	O	Score Setting	X	X	X	X	-	-	
Lyric on/off	O	X	X	X	X	-	O	Score Setting	X	X	X	X	-	-	
Chord on/off	O	X	X	X	X	-	O	Score Setting	X	X	X	X	-	-	
NoteName on/off	O	X	X	X	X	-	O	Score Setting	X	X	X	X	-	-	
Size	O	X	X	X	X	-	O	Score Setting	X	X	X	X	-	-	
Left ch.	O	X	X	X	X	-	O	Score Setting	X	X	X	X	-	-	
Right ch.	O	X	X	X	X	-	O	Score Setting	X	X	X	X	-	-	

Parameter	System				Voice Set	Voice Set Group	Song		Style		Multi Pad	Registration		Parameter Lock Group	Note
	SetUp	MIDI Setup	User Effect	Music Finder			Song	Song Setup Group	Style Data	OTS		Regist	Freeze Group		
KeySignature	X	X	X	X	X	-	O	Score Setting	X	X	X	X	-	-	
Quantize	O	X	X	X	X	-	O	Score Setting	X	X	X	X	-	-	
NoteName	O	X	X	X	X	-	O	Score Setting	X	X	X	X	-	-	
ColorNote On/Off	O	X	X	X	X	-	O	Score Setting	X	X	-	X	-	-	
Song Position Jump															
SP1–4 Position Sw On/Off	X	X	X	X	X	-	O	(Double-clicking [SP1]–[SP4])	X	X	X	X	-	-	
Loop Sw On/Off	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Recording data															
Song XG data	X	X	X	X	X	X	O	-	X	X	X	X	-	-	
Style															
AccompanimentOn/Off	X	X	X	X	X	-	X	-	X	O (On)	X	O	Style	-	
OTSLink	X	X	X	O (On)	X	-	X	-	X	X	X	X	-	-	
AutoFillIn	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Section	X	X	X	X	X	-	X	-	X	X	X	O	Style	-	
SynchroStart	X	X	X	X	X	-	X	-	X	O (On)	X	O	Style	-	
SynchroStop	X	X	X	X	X	-	X	-	X	X	X	O	Style	-	
StartStop	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Menu > Function > StyleSetting/SplitPoint/Chord Fingering															
Style Setting															
StopAcmp	O	X	X	X	X	-	X	-	X	X	X	O	Style	-	
OTSLinkTiming	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
SynchroStopWindow	O	X	X	X	X	-	X	-	X	X	X	O	Style	-	
StyleTouch	O	X	X	X	X	-	X	-	X	X	X	O	Style	-	
SectionSet	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Tempo Hold	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Part On/Off	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
SplitPoint															
SplitPoint (Left)	O	X	X	X	X	-	X	-	X	X	X	O	Style	Split Point	
SplitPoint (Style)	O	X	X	X	X	-	O	Guide Setting	X	X	X	O	Style	Split Point	
SplitPoint (Right3)	O	X	X	X	X	-	X	-	X	X	X	O	Voice	Split Point	
Chord Fingering															
FingeringType	O	X	X	X	X	-	X	-	X	X	X	O	Style	Fingering	
Chord Root Note	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
ChordRoot Type	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Menu > DigitalRecording > Style Creator															
BASIC															
Section	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Pattern Length	X	X	X	X	X	-	X	-	O	X	X	X	-	-	
Tempo	X	X	X	X	X	-	X	-	O	X	X	X	-	-	
Beat	X	X	X	X	X	-	X	-	O	X	X	X	-	-	
Assembly															
Source Pattern	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Section	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Channel	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Play Type	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Groove > Groove															
Original Beat	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Beat Converter	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Swing	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Fine	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Groove > Dynamics															
Channel	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Accent Type	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Strength	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Expand/Comp.	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Boost/Cut	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Channel > Quantize															
Channel	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Size	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Strength	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Channel > Velocity Change															
Channel	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Boost/Cut	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Channel > Bar Copy															
Channel	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Source Top	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Source Last	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Destination	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Channel > Bar Clear															
Channel	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Source Top	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Source Last	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Channel > Remove Event															
Channel	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Event	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Parameter															
Channel	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Source Root	X	X	X	X	X	-	X	-	O	X	X	X	-	-	
Source Chord	X	X	X	X	X	-	X	-	O	X	X	X	-	-	
NTR	X	X	X	X	X	-	X	-	O	X	X	X	-	-	
NTT	X	X	X	X	X	-	X	-	O	X	X	X	-	-	
NTT BASS	X	X	X	X	X	-	X	-	O	X	X	X	-	-	
High Key	X	X	X	X	X	-	X	-	O	X	X	X	-	-	
Note Limit Low	X	X	X	X	X	-	X	-	O	X	X	X	-	-	
Note Limit High	X	X	X	X	X	-	X	-	O	X	X	X	-	-	
RTR	X	X	X	X	X	-	X	-	O	X	X	X	-	-	

Parameter	System				Voice Set	Voice Set Group	Song		Style		Multi Pad	Registration		Parameter Lock Group	Note
	SetUp	MIDI Setup	User Effect	Music Finder			Song	Song Setup Group	Style Data	OTS		Regist	Freeze Group		
Edit > Filter															
Main Filter	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Control Change Filter	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
MusicFinder															
SortBy	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
SortOrder	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
StyleTempo	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Information	O	X	X	X	X	-	X	-	X	X	X	X	-	-	Cannot be reset with Factory Reset.
Search1/2 display															
Music	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Keyword	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Style	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Beat	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
SearchArea	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Tempo (From)	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Tempo (To)	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Genre	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Search Result	X	X	X	O	X	-	X	-	X	X	X	X	-	-	
Record (=Property settings)	X	X	X	O	X	-	X	-	X	X	X	X	-	-	
Recording data															
SFF data	X	X	X	X	X	-	X	-	O	X	X	X	-	-	
MultiPad															
Multi Pad ContentsName	X	X	X	X	X	-	X	-	X	X	O	X	-	-	
Sync Start	X	X	X	X	X	-	X	-	X	X	X	O	MultiPad	-	
Menu > DigitalRecording > Multi Pad Creator															
Record															
Repeat	X	X	X	X	X	-	X	-	X	X	O	X	-	-	
Chord Match	X	X	X	X	X	-	X	-	X	X	O	X	-	-	
Edit > Filter															
Main Filter	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Control Change Filter	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Recording data															
Multi Pad data											O				
Voice Effect															
LeftHold	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	Style	-	
Initial Touch On/Off	X	X	X	X	X	-	X	-	X	X	X	O	Voice	-	
Harmony/Echo	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	Harmony	-	
Poly/Mono (Right1)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Poly/Mono (Right2)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Poly/Mono (Right3)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Poly/Mono (Left)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
Panel Sustain	X	X	X	X	X	-	X	-	X	X	X	O	Voice	-	
DSP (Right1)	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Voice	-	
DSP (Right2)	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Voice	-	
DSP (Right3)	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Voice	-	
DSP (Left)	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Style	-	
Variation (Right1)	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Voice	-	
Variation (Right2)	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Voice	-	
Variation (Right3)	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Voice	-	
Variation (Left)	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Style	-	
Voice Selection > Voice Set (Editer)															
Voice (Right1)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Voice (Right2)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Voice (Right3)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Voice (Left)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Style	-	
COMMON															
Volume for Balance (Right1)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Volume for Balance (Right2)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Volume for Balance (Right3)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Volume for Balance (Left)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
Touch Sense Depth (Right1)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Touch Sense Depth (Right2)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Touch Sense Depth (Right3)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Touch Sense Depth (Left)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
Touch Sense Offset (Right1)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Touch Sense Offset (Right2)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Touch Sense Offset (Right3)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Touch Sense Offset (Left)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
Octave for Right1	X	X	X	X	O	Voice	X	-	X	O	X	O	Voice	-	
Octave for Right2	X	X	X	X	O	Voice	X	-	X	O	X	O	Voice	-	
Octave for Right3	X	X	X	X	O	Voice	X	-	X	O	X	O	Voice	-	
Octave for Left	X	X	X	X	O	Voice	X	-	X	O	X	O	Style	-	
CONTROLLER															
MW Low Pass Filter Control (Right1)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
MW Low Pass Filter Control (Right2)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
MW Low Pass Filter Control (Right3)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
MW Low Pass Filter Control (Left)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
MW Amplitude Control (Right1)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
MW Amplitude Control (Right2)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
MW Amplitude Control (Right3)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
MW AmpLitude Control (Left)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
MW LFO PMOD Depth (Right1)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
MW LFO PMOD Depth (Right2)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
MW LFO PMOD Depth (Right3)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
MW LFO PMOD Depth (Left)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
MW LFO FMOD Depth (Right1)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
MW LFO FMOD Depth (Right2)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
MW LFO FMOD Depth (Right3)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
MW LFO FMOD Depth (Left)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	

Parameter	System				Voice Set	Voice Set Group	Song		Style		Multi Pad	Registration		Parameter Lock Group	Note
	SetUp	MIDI Setup	User Effect	Music Finder			Song	Song Setup Group	Style Data	OTS		Regist	Freeze Group		
MW LFO AMOD Depth (Right1)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
MW LFO AMOD Depth (Right2)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
MW LFO AMOD Depth (Right3)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
MW LFO AMOD Depth (Left)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
CAT Low Pass Filter Control (Right1)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
CAT Low Pass Filter Control (Right2)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
CAT Low Pass Filter Control (Right3)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
CAT Low Pass Filter Control (Left)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
CAT Amplitude Control (Right1)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
CAT Amplitude Control (Right2)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
CAT Amplitude Control (Right3)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
CAT Amplitude Control (Left)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
CAT LFO PMOD Depth (Right1)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
CAT LFO PMOD Depth (Right2)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
CAT LFO PMOD Depth (Right3)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
CAT LFO PMOD Depth (Left)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
CAT LFO FMOD Depth (Right1)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
CAT LFO FMOD Depth (Right2)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
CAT LFO FMOD Depth (Right3)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
CAT LFO FMOD Depth (Left)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
CAT LFO AMOD Depth (Right1)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
CAT LFO AMOD Depth (Right2)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
CAT LFO AMOD Depth (Right3)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
CAT LFO AMOD Depth (Left)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
SOUND															
EG Attack (Right1)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
EG Attack (Right2)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
EG Attack (Right3)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
EG Attack (Left)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
EG Decay (Right1)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
EG Decay (Right2)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
EG Decay (Right3)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
EG Decay (Left)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
EG Release (Right1)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
EG Release (Right2)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
EG Release (Right3)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
EG Release (Left)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
Vibrato Depth (Right1)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Vibrato Depth (Right2)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Vibrato Depth (Right3)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Vibrato Depth (Left)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
Vibrato Speed (Right1)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Vibrato Speed (Right2)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Vibrato Speed (Right3)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Vibrato Speed (Left)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
Vibrato Delay (Right1)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Vibrato Delay (Right2)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Vibrato Delay (Right3)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Vibrato Delay (Left)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
EFFECT/EQ															
Panel Sustain (Right1)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Panel Sustain (Right2)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Panel Sustain (Right3)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Panel Sustain (Left)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
DSP Type (Right1)	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Voice	-	
DSP Type (Right2)	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Voice	-	
DSP Type (Right3)	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Voice	-	
DSP Type (Left)	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Style	-	
DSP Variation Value (Right1)	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Voice	-	
DSP Variation Value (Right2)	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Voice	-	
DSP Variation Value (Right3)	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Voice	-	
DSP Variation Value (Left)	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Style	-	
EQ Low Freq (Right1)	X	X	X	X	O	EQ	O	Keyboard Voice	X	O	X	O	Voice	-	
EQ Low Freq (Right2)	X	X	X	X	O	EQ	O	Keyboard Voice	X	O	X	O	Voice	-	
EQ Low Freq (Right3)	X	X	X	X	O	EQ	O	Keyboard Voice	X	O	X	O	Voice	-	
EQ Low Freq (Left)	X	X	X	X	O	EQ	O	Keyboard Voice	X	O	X	O	Style	-	
EQ High Freq (Right1)	X	X	X	X	O	EQ	O	Keyboard Voice	X	O	X	O	Voice	-	
EQ High Freq (Right2)	X	X	X	X	O	EQ	O	Keyboard Voice	X	O	X	O	Voice	-	
EQ High Freq (Right3)	X	X	X	X	O	EQ	O	Keyboard Voice	X	O	X	O	Voice	-	
EQ High Freq (Left)	X	X	X	X	O	EQ	O	Keyboard Voice	X	O	X	O	Style	-	
OrganFlute > Footage															
Organ Flutes Footage (Right1)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Flutes Footage (Right2)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Flutes Footage (Right3)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Flutes Footage (Left)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Style	-	
Organ Flutes Type (Right1)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Flutes Type (Right2)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Flutes Type (Right3)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ FlutesType (Left)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Style	-	
Organ Vib On/Off (Right1)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Vib On/Off (Right2)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Vib On/Off (Right3)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Vib On/Off (Left)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Style	-	
Organ Vib Depth (Right1)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Vib Depth (Right2)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Vib Depth (Right3)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	

Parameter	System				Voice Set	Voice Set Group	Song		Style		Multi Pad	Registration		Parameter Lock Group	Note
	SetUp	MIDI Setup	User Effect	Music Finder			Song	Song Setup Group	Style Data	OTS		Regist	Freeze Group		
Organ Vib Depth (Left)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
Organ Vib Speed (Right1)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Vib Speed (Right2)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Vib Speed (Right3)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Vib Speed (Left)	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
OrganFlute > Footage															
Organ Flutes Attack Footage (Right1)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Flutes Attack Footage (Right2)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Flutes Attack Footage (Right3)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Flutes Attack Footage (Left)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Style	-	
Organ Flutes Attack Mode (Right1)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Flutes Attack Mode (Right2)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Flutes Attack Mode (Right3)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Flutes Attack Mode (Left)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Style	-	
Organ Flutes Attack length (Right1)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Flutes Attack length (Right2)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Flutes Attack length (Right3)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Flutes Attack length (Left)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Style	-	
Organ Flutes Response (Right1)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Flutes Response (Right2)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Flutes Response (Right3)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Flutes Response (Left)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Style	-	
Organ Flutes Volume (Right1)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Flutes Volume (Right2)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Flutes Volume (Right3)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Organ Flutes Volume (Left)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Style	-	
Mic															
VocalHarmony On/Off	X	X	O	X	X	-	O	VH/MIC	X	X	X	O	VH/MIC	VH/MIC	
Talk On/Off	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Effect On/Off	X	X	X	X	X	-	O	VH/MIC	X	X	X	O	VH/MIC	VH/MIC	
VHType	X	X	X	X	X	-	O	VH/MIC	X	X	X	O	VH/MIC	VH/MIC	
VHParameters	X	X	O	X	X	-	O	VH/MIC	X	X	X	X	-	VH/MIC	
Mic Setting															
User Memory	O	X	O	X	X	-	X	-	X	X	X	X	-	-	
Mic Setting > Vocal															
Mic On/Off	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
EQ Low Freq.	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
EQ Low Gain	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
EQ Mid Freq.	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
EQ Mid Gain	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
EQ High Freq.	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
EQ High Gain	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
Noise Gate SW	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
Noise Gate TH	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
Compressow SW	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
Compressor TH	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
Compressor RAT	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
Compressor OUT	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
Pitch Detect Vocal Type	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
Pitch Detect Back Ground Noise Cut	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
Pitch Detect Speed	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
Mic Setting > Talk															
Talk Setting Volume	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
Talk Setting Pan	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
Talk Setting ReverbDepth	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
Talk Setting ChorusDepth	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
Talk Setting TotalVolumeAttenuator	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
EQ Low Freq.	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
EQ Low Gain	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
EQ Mid Freq.	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
EQ Mid Gain	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
EQ High Freq.	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
EQ High Gain	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
Noise Gate SW	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
Noise Gate TH	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
Compressow SW	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
Compressor TH	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
Compressor RAT	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
Compressor OUT	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
Vocal Harmony Setting															
Vocal Harmony > SETUP															
VH Song Channel Mute	X	X	X	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
VH Song Channel	X	X	X	X	X	-	O	VH/MIC	X	X	X	O	VH/MIC	VH/MIC	
VH Keyboard	X	X	X	X	X	-	O	VH/MIC	X	X	X	O	VH/MIC	VH/MIC	
VH Chord Detect	X	X	X	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Vocal Harmony > Overview															
Harmony Mode	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Chordal Type	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Balance	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Vocal Effect Type	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Vocal Effect Depth (LEAD)	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Vocal Effect Depth (Harmony)	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Reverb Depth	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Chorus Depth	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Vocal Harmony > Overview > Harmony Assign Popup															
Transepose Mode	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	

Parameter	System				Voice Set	Voice Set Group	Song		Style		Multi Pad	Registration		Parameter Lock Group	Note
	SetUp	MIDI Setup	User Effect	Music Finder			Song	Song Setup Group	Style Data	OTS		Regist	Freeze Group		
Session Table	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Key Root	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Key Type	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Vocal Harmony > Part															
Pitch Correcnt	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Lead Transpose	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Lead Detune	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Lead Formant Shift	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Lead Level	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Lead Pan	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Lead Octave	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Harmony Transpose1	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Harmony Detune1	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Harmony Formant Shift1	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Harmony Level1	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Harmony Pan1	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Harmony Degree1	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Harmony Transpose2	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Harmony Detune2	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Harmony Formant Shift2	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Harmony Level2	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Harmony Pan2	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Harmony Degree2	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Harmony Transpose3	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Harmony Detune3	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Harmony Formant Shift3	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Harmony Level3	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Harmony Pan3	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Harmony Degree3	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Vocal Harmony > Detail															
Lead Pitch Detect Speed	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Harmony Pitch Detect Speed	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Lead Vibrato Depth	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Harmony Vibrato Depth	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Vibrato Speed	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Vibrato Delay	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Harmony Effect	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Harmony Stbility	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Synth Vocoder > Overview															
Carrier	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Vocoder Attack	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Vocoder Release	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
HPF Freq	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
HPF Output Level	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Formant Shift	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Formant Offset	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Carrier Volume	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Carrier Octave	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Carrier Noise	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Vocal Effect Type	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Vocal Effect Depth	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Reverb Depth	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Chorus Depth	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Synth Vocoder > Detail															
BPF1 Gain	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
BPF2 Gain	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
BPF3 Gain	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
BPF4 Gain	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
BPF5 Gain	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
BPF6 Gain	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
BPF7 Gain	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
BPF8 Gain	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
BPF9 Gain	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
BPF10 Gain	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Vocal Effect Parameter															
Effect Parameter(#1–#16)	X	X	O	X	X	-	X	-	X	X	X	O	VH/MIC	VH/MIC	
Mixing Console > Voice															
Volume															
Offset Volume Song	X	X	X	X	X	-	X	-	X	X	X	O	Song	-	
Offset Volume Style	X	X	X	X	X	-	X	-	X	X	X	O	Style	-	
Volume M.Pad	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	MultiPad	-	
Volume Mic	X	X	X	X	X	-	O	VH/MIC	X	X	X	O	VH/MIC	VH/MIC	
Volume Left	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	Style	-	
Volume Right1	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Volume Right2	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Volume Right3	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Part Volume Song	X	X	X	X	X	-	O	Volume	X	X	X	X	-	-	
Part Volume Style	X	X	X	X	X	-	X	-	O	X	X	O	Style	-	
Keyboard Volume	X	X	X	X	X	-	X	-	X	X	X	O	Voice	-	
Audio Play Volume	X	X	X	X	X	-	X	-	X	X	X	O	Audio	-	
PanPot															
Offset PanPot Song	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Offset PanPot Style	X	X	X	X	X	-	X	-	X	X	X	O	Style	-	
PanPot M.Pad	X	X	X	X	X	-	X	-	X	X	X	O	MultiPad	-	
PanPot Mic	X	X	X	X	X	-	O	VH/MIC	X	X	X	O	VH/MIC	VH/MIC	
PanPot Left	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	Style	-	
PanPot Right1	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	Voice	-	
PanPot Right2	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	Voice	-	
PanPot Right3	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	Voice	-	

Parameter	System				Voice Set	Voice Set Group	Song		Style		Multi Pad	Registration		Parameter Lock Group	Note
	SetUp	MIDI Setup	User Effect	Music Finder			Song	Song Setup Group	Style Data	OTS		Regist	Freeze Group		
Part PanPot Song	X	X	X	X	X	-	O	Pan	X	X	X	X	-	-	
Part PanPot Style	X	X	X	X	X	-	X	-	O	X	X	O	Style	-	
Voice															
Voice (Right1)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Voice (Right2)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Voice (Right3)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Voice (Left)	X	X	X	X	O	-	O	Keyboard Voice	X	O	X	O	Style	-	
Voice (Style Part)	X	X	X	X	X	-	X	-	O	X	X	O	Style	-	
Voice (Song Part)	X	X	X	X	X	-	O	Voice	X	X	X	X	-	-	
Auto Revoice															
Auto Revoice On/Off	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Auto Revoice Setup	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Mixing Console > Filter															
Brightness															
Brightness Song Part	X	X	X	X	X	-	O	Filter	X	X	X	X	-	-	
Brightness Style Part	X	X	X	X	X	-	X	-	O	X	X	O	Style	-	
Brightness Right1	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Brightness Right2	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Brightness Right3	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Brightness Left	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
Harmonic Content															
Harmonic Content Song Part	X	X	X	X	X	-	O	Filter	X	X	X	X	-	-	
Harmonic Content Style Part	X	X	X	X	X	-	X	-	O	X	X	O	Style	-	
Harmonic Content Right1	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Harmonic Content Right2	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Harmonic Content Right3	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Harmonic Content Left	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
Mixing Console > Tune															
Octave															
Octave Right1	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Octave Right2	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Octave Right3	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Octave Left	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
Tune															
Tune Right1	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Tune Right2	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Tune Right3	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Tune Left	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	Style	-	
Portamento Time															
Portamento Time Right1	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Portamento Time Right2	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Portamento Time Right3	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Voice	-	
Portamento Time Left	X	X	X	X	O	Voice	O	Keyboard Voice	X	O	X	O	Style	-	
Pitch Bend Range															
Pitch Bend Range Right1	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Pitch Bend Range Right2	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Pitch Bend Range Right3	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	Voice	-	
Pitch Bend Range Left	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	Style	-	
Transpose															
Master Transpose	X	X	X	X	X	-	X	-	X	X	X	O	Transpose	-	
Song Transpose	X	X	X	X	X	-	X	-	X	X	X	O	Transpose	-	
Keyboard Transpose	X	X	X	X	X	-	X	-	X	X	X	O	Transpose	-	
Mixing Console > EQ															
MasterEQ Type	O	X	X	X	X	-	X	-	X	X	X	X	-	MasterEQ	
MasterEQ Parameter	X	X	O	X	X	-	X	-	X	X	X	X	-	MasterEQ	
EQ Low Gain															
EQ Low Gain Style Part	X	X	X	X	X	-	X	-	O	X	X	O	Style	-	
EQ Low Gain Song Part	X	X	X	X	X	-	O	EQ	X	X	X	X	-	-	
EQ Low Gain Multi Pad	X	X	X	X	X	-	X	-	X	X	X	O	MultiPad	-	
EQ Low Gain Right1	X	X	X	X	O	EQ	O	Keyboard Voice	X	O	X	O	Voice	-	
EQ Low Gain Right2	X	X	X	X	O	EQ	O	Keyboard Voice	X	O	X	O	Voice	-	
EQ Low Gain Right3	X	X	X	X	O	EQ	O	Keyboard Voice	X	O	X	O	Voice	-	
EQ Low Gain Left	X	X	X	X	O	EQ	O	Keyboard Voice	X	O	X	O	Style	-	
EQ Low Gain Style (Offset)	X	X	X	X	X	-	X	-	X	X	X	O	Style	-	
EQ Low Gain Song (Offset)	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
EQ High Gain															
EQ High Gain Style Part	X	X	X	X	X	-	X	-	O	X	X	O	Style	-	
EQ High Gain Song Part	X	X	X	X	X	-	O	EQ	X	X	X	X	-	-	
EQ High Gain Multi Pad	X	X	X	X	X	-	X	-	X	X	X	O	MultiPad	-	
EQ High Gain Right1	X	X	X	X	O	EQ	O	Keyboard Voice	X	O	X	O	Voice	-	
EQ High Gain Right2	X	X	X	X	O	EQ	O	Keyboard Voice	X	O	X	O	Voice	-	
EQ High Gain Right3	X	X	X	X	O	EQ	O	Keyboard Voice	X	O	X	O	Voice	-	
EQ High Gain Left	X	X	X	X	O	EQ	O	Keyboard Voice	X	O	X	O	Style	-	
EQ High Gain Style (Offset)	X	X	X	X	X	-	X	-	X	X	X	O	Style	-	
EQ High Gain Song (Offset)	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Mixing Console > Effect															
Reverb Type															
Reverb Type	X	X	X	X	X	-	O	Effect	O	X	X	O	Style/Song	Reverb Type	
Reverb Return Level	X	X	X	X	X	-	O	Effect	O	X	X	O	Style/Song	Reverb Return Level	
Reverb Depth															
Reverb Depth Style Part	X	X	X	X	X	-	X	-	O	X	X	O	Style	-	
Reverb Depth Song Part	X	X	X	X	X	-	O	Effect	X	X	X	X	-	-	
Reverb Depth Multi Pad	X	X	X	X	X	-	X	-	X	X	X	O	MultiPad	-	
Reverb Depth Mic	X	X	X	X	X	-	O	VH/MIC	X	X	X	O	VH/MIC	VH/MIC	
Reverb Depth Right1	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Voice	-	
Reverb Depth Right2	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Voice	-	
Reverb Depth Right3	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Voice	-	
Reverb Depth Left	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Style	-	
Reverb Depth Style (Offset)	X	X	X	X	X	-	X	-	X	X	X	O	Style	-	

Parameter	System				Voice Set	Voice Set Group	Song		Style		Multi Pad	Registration		Parameter Lock Group	Note
	SetUp	MIDI Setup	User Effect	Music Finder			Song	Song Setup Group	Style Data	OTS		Regist	Freeze Group		
Reverb Depth Song (Offset)	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Chorus Type															
Chorus Type	X	X	X	X	X	-	O	Effect	O	X	X	O	Style/Song	-	
Chorus Return Level	X	X	X	X	X	-	O	Effect	O	X	X	O	Style/Song	Chorus Return Level	
Chorus Depth															
Chorus Depth Style Part	X	X	X	X	X	-	X	-	O	X	X	O	Style	-	
Chorus Depth Song Part	X	X	X	X	X	-	O	Effect	X	X	X	X	-	-	
Chorus Depth Multi Pad	X	X	X	X	X	-	X	-	X	X	X	O	MultiPad	-	
Chorus Depth Mic	X	X	X	X	X	-	O	VH/MIC	X	X	X	O	VH/MIC	VH/MIC	
Chorus Depth Right1	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Voice	-	
Chorus Depth Right2	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Voice	-	
Chorus Depth Right3	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Voice	-	
Chorus Depth Left	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Style	-	
Chorus Depth Style (Offset)	X	X	X	X	X	-	X	-	X	X	X	O	Style	-	
Chorus Depth Song (Offset)	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
DSP Type															
DSP1 (Variation) Type	X	X	X	X	X	-	O	Effect	O	X	X	O	Style/Song	-	
DSP1 (Variation) Return Level	X	X	X	X	X	-	O	Effect	O	X	X	O	Style/Song	DSP1 Return Level	
DSP2Type	X	X	X	X	X	-	O	Effect	X	X	X	O	Voice/Style/Song	-	
DSP3Type	X	X	X	X	X	-	O	Effect	X	X	X	O	Voice/Style/Song	-	
DSP4Type	X	X	X	X	X	-	O	Effect	X	X	X	O	Voice/Style/Song	-	
DSP5Type	X	X	X	X	X	-	O	Effect	X	X	X	O	Voice/Style/Song	-	
DSP6Type	X	X	X	X	X	-	O	Effect	X	X	X	O	Voice/Style/Song	-	
DSP7Type	X	X	X	X	X	-	O	VH/MIC	X	X	X	O	Style/Song/VH/MIC	VH/MIC	
DSP8Type	X	X	X	X	X	-	O	-	X	X	X	O	Style	-	
DSP9Type	X	X	X	X	X	-	O	-	X	X	X	O	Style	-	
DSP Depth															
DSP Depth Style Part	X	X	X	X	X	-	X	-	O	X	X	O	Style	-	
DSP Depth Song Part	X	X	X	X	X	-	O	Effect	X	X	X	X	-	-	
DSP Depth Right1	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Voice	-	
DSP Depth Right2	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Voice	-	
DSP Depth Right3	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Voice	-	
DSP Depth Left	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Style	-	
DSP Depth Mic	X	X	X	X	X	-	O	VH/MIC	X	X	X	O	VH/MIC	-	
InsertionType															
Ins.Type (Right1)	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Voice	-	
Ins.Type (Right2)	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Voice	-	
Ins.Type (Right3)	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Voice	-	
Ins.Type (Left)	X	X	X	X	O	Effect	O	Keyboard Voice	X	O	X	O	Style	-	
Ins. Type (Song)	X	X	X	X	X	-	O	Effect	X	X	X	X	-	-	
Ins.Type (Mic)	X	X	X	X	X	-	O	VH/MIC	X	X	X	O	VH/MIC	VH/MIC	
Effect Parameter (Reverb/Chorus/DSP1–6)	X	X	O	X	X	-	O	Effect	X	X	X	X	-	-	
Effect Parameter (DSP7)	X	X	O	X	X	-	O	VH/MIC	X	X	X	X	-	-	
Effect Parameter (DSP8–9)	X	X	O	X	X	-	O	Style	X	X	X	X	-	-	
Mixing Console > CMP															
MasterCmpressor Type	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
MasterCmpressor Threshold Offset	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
MasterCmpressor Ratio Offset	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
MasterCmpressor OutPutOffset	X	X	O	X	X	-	X	-	X	X	X	X	-	-	
MasterCmpressor On/Off	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Mixing Console > LineOut															
LineOut	O	X	X	X	X	-	X	-	X	X	-	O	LineOut	-	
Channel On/Off															
ChannelOn/Off (Song)	X	X	X	X	X	-	X	-	X	X	X	O	Song	-	
ChannelOn/Off (Style)	X	X	X	X	X	-	X	-	X	X	X	O	Style	-	
MIDI															
MIDI Template															
Template No.	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Preset Template Name	X	O	X	X	X	-	X	-	X	X	X	X	-	-	
Menu > Function > MIDI															
System															
Local Control	X	O	X	X	X	-	X	-	X	X	X	X	-	-	
Clock	X	O	X	X	X	-	X	-	X	X	X	X	-	-	
Transmit Clock	X	O	X	X	X	-	X	-	X	X	X	X	-	-	
Receive Transpose	X	O	X	X	X	-	X	-	X	X	X	X	-	-	
Receive Start/Stop	X	O	X	X	X	-	X	-	X	X	X	X	-	-	
SysEx Transmit	X	O	X	X	X	-	X	-	X	X	X	X	-	-	
SysEx Receive	X	O	X	X	X	-	X	-	X	X	X	X	-	-	
Chord SysEx Transmit	X	O	X	X	X	-	X	-	X	X	X	X	-	-	
Chord SysEx Receive	X	O	X	X	X	-	X	-	X	X	X	X	-	-	
Transmit															
Part Select	X	O	X	X	X	-	X	-	X	X	X	X	-	-	
Ch (for each part)	X	O	X	X	X	-	X	-	X	X	X	X	-	-	
Filter (for each part)	X	O	X	X	X	-	X	-	X	X	X	X	-	-	
Receive															
CH Select	X	O	X	X	X	-	X	-	X	X	X	X	-	-	
Part Select	X	O	X	X	X	-	X	-	X	X	X	X	-	-	
Filter (for each channel)	X	O	X	X	X	-	X	-	X	X	X	X	-	-	
Bass (On Bass Note)															
Bass (On Bass Note)	X	O	X	X	X	-	X	-	X	X	X	X	-	-	
Chord Detect															
Chord Detect	X	O	X	X	X	-	X	-	X	X	X	X	-	-	
MFC10															
MFC10 SW Function (0-29)	X	O	X	X	X	-	X	-	X	X	X	X	-	-	
MFC10 Foot Function (1-5)	X	O	X	X	X	-	X	-	X	X	X	X	-	-	
MFC10 Receive Port	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
MFC10 Foot Part (0-4)	X	O	X	X	X	-	X	-	X	X	X	X	-	-	
MFC10 Receive (Ch1-16)	O	X	X	X	X	-	X	-	X	X	X	X	-	-	

Parameter	System				Voice Set	Voice Set Group	Song		Style		Multi Pad	Registration		Parameter Lock Group	Note
	SetUp	MIDI Setup	User Effect	Music Finder			Song	Song Setup Group	Style Data	OTS		Regist	Freeze Group		
Menu > Function > Mater Tune/Scale Tune															
Master Tune															
MasterTune	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Scale Tune															
Scale	X	X	X	X	X	-	X	-	X	X	X	O	Scale	-	
Tune	X	X	X	X	X	-	X	-	X	X	X	O	Scale	-	
BaseNote	X	X	X	X	X	-	X	-	X	X	X	O	Scale	-	
Part Select (Right1/Right2/Right3, Left,Style,Multi Pad)	X	X	X	X	X	-	X	-	X	X	X	O	Scale	-	
Menu > Function > Controller															
Slider															
Assign Slider	O	X	X	X	X	X	X	X	X	X	X	O	Slider	-	
Foot Pedal															
PedalFunction	X	X	X	X	X	X	X	X	X	X	X	O	Pedal	-	
PedalSettings	X	X	X	X	X	X	X	X	X	X	X	O	Pedal	-	
PedalPolarity	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Keyboard/Panel															
Initial Touch	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Initial TouchOffLevel	X	X	X	X	X	-	X	-	X	X	X	O	Voice	-	
Initial Touch Part On/Off	X	X	X	X	X	-	X	-	X	X	X	O	Voice	-	
After Touch	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
After Touch Part On/Off	X	X	X	X	X	-	X	-	X	X	X	O	Voice	-	
ModulationWheelPartOn/Off	X	X	X	X	X	-	X	-	X	X	X	O	Voice	-	
TransposeAssign	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Menu > Function > Regist.Sequence/Freeze/VoiceSet															
Regist Sequence															
RegistSequenceData	X	X	X	X	X	-	X	-	X	X	X	O	-	-	Memorized as a single Registration Bank file.
RegistSequenceEnable	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Regist (+) Pedal	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Regist (-) Pedal	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
SequenceEnd	X	X	X	X	X	-	X	-	X	X	X	O	-	-	Memorized as a single Registration Bank file.
Freeze Group															
FreezeGroupSetting	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
VoiceSet															
VoiceSet Group Right1 On/Off	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
VoiceSet Group Right2 On/Off	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
VoiceSet Group Left On/Off	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
VoiceSet Group Right3 On/Off	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Menu > Function > Harmony/Echo															
Type	X	X	X	X	O	Harmo-ny	O	Keyboard Voice	X	O	X	O	Harmony	-	
Volume	X	X	X	X	O	Harmo-ny	O	Keyboard Voice	X	O	X	O	Harmony	-	
Speed	X	X	X	X	O	Harmo-ny	O	Keyboard Voice	X	O	X	O	Harmony	-	
Assign	X	X	X	X	O	Harmo-ny	O	Keyboard Voice	X	O	X	O	Harmony	-	
ChordNoteOnly	X	X	X	X	O	Harmo-ny	O	Keyboard Voice	X	O	X	O	Harmony	-	
TouchLimit	X	X	X	X	O	Harmo-ny	O	Keyboard Voice	X	O	X	O	Harmony	-	
Menu > Function > Screen Out															
Monitor Type	O	X	X	X	X	-	X	-	X	X	X	X	-	-	Cannot be reset with Factory Reset.
ScreenContent	O	X	X	X	X	-	X	-	X	X	X	X	-	-	Cannot be reset with Factory Reset.
Menu > Function > Utility															
Configration1															
FadeInTime	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
FadeOutTIme	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
FadeOutHoldTime	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
MetronomeVolume	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
MetronomeSound	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
TimeSignature	X	X	X	X	X	-	O	-	O	X	X	X	-	-	
ParameterLock	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
TapCountPercussion	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	Style	-	
TapCountVelocity	X	X	X	X	X	-	O	Keyboard Voice	X	O	X	O	Style	-	
Configration2															
Speaker	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
DisplayVoiceNumber	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Aux Out/Loop Send	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
VoiceCategory Button Options	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Display Style Tempo	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Popup Display Time	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
SA2 Auto Articulation	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Media															
SongAutoOpen	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
HD Sleep Time	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Owner															
Language	O	X	X	X	X	-	X	-	X	X	X	X	-	-	Cannot be reset with Factory Reset.
OwnerName	O	X	X	X	X	-	X	-	X	X	X	X	-	-	Cannot be reset with Factory Reset.
MainPicture	O	X	X	X	X	-	X	-	X	X	X	X	-	-	Cannot be reset with Factory Reset.
SystemReset															
FactoryResetSetting	X	X	X	X	X	-	X	-	X	X	X	X	-	-	Language, Owner Name, Main Picture Back-Ground, Lyric Picture BackGround, and Screen Out related parameters are not reset.
Registration															
FreezeOn/Off	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
RegistMemory Contents	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
RegistNumber	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
RegistContentsName	X	X	X	X	X	-	X	-	X	X	X	O	-	-	

Parameter	System				Voice Set	Voice Set Group	Song		Style		Multi Pad	Registration		Parameter Lock Group	Note
	SetUp	MIDI Setup	User Effect	Music Finder			Song	Song Setup Group	Style Data	OTS		Regist	Freeze Group		
OTS															
OTSNumber	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Master Volume Fade In/Out															
Fade in/out	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Metronome															
Start/Stop	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Transpose															
Transpose	X	X	X	X	X	-	X	-	X	X	X	O	Transpose	-	
Upper Octave															
UpperOctave	X	X	X	X	X	-	X	-	X	X	X	O	Voice	-	
Direct Access															
Direct Access	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Audio															
Audio Player File	X	X	X	X	X	-	X	-	X	X	X	O	Audio	-	
Playback Mode	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Simple Recoder															
Input Volume	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Output Mute Sw	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Audio Play Volume	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Multi Recoder															
Input Volume	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Output Volume	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Output Mute Sw	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Rcording Mode	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Piunch In/Out Mode	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Nudge Mode	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Mix Down															
File Name	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Save To	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
PlayList															
Repeat Mode	O	X	X	X	X	-	X	-	X	X	X	X	-	-	
Sort By	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Mark Sw	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Custom Voice															
Wave Import (Normal Voice)															
Wave Element	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Start Key	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
End Key	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Add Wave															
Fixed Pitch	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Center Key	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Start Key	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Wave Import (Drum Kit)															
Volume	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Pan	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Reverb	X	X	X	X	X	-	X	-	X	X	X	X	-	-	Change DrumSetup Reverb Send Level.
Receive Note Off	X	X	X	X	X	-	X	-	X	X	X	X	-	-	Change DrumSetup Receive Note Off.
Alternate Group	X	X	X	X	X	-	X	-	X	X	X	X	-	-	
Select Wave (Drum Kit)															
Change the List (Preset/WXP.)	X	X	X	X	X	-	X	-	X	X	X	X	-	-	

Many MIDI messages listed in the MIDI Data Format are expressed in decimal numbers, binary numbers and hexadecimal numbers.
Hexa-decimal numbers may include the letter "H" as a suffix. Also, "n" can freely be defined as any whole number.
To enter data/values, refer to the table below.

Decimal	Hexadecimal	Binary
0	00	0000 0000
1	01	0000 0001
2	02	0000 0010
3	03	0000 0011
4	04	0000 0100
5	05	0000 0101
6	06	0000 0110
7	07	0000 0111
8	08	0000 1000
9	09	0000 1001
10	0A	0000 1010
11	0B	0000 1011
12	0C	0000 1100
13	0D	0000 1101
14	0E	0000 1110
15	0F	0000 1111
16	10	0001 0000
17	11	0001 0001
18	12	0001 0010
19	13	0001 0011
20	14	0001 0100
21	15	0001 0101
22	16	0001 0110
23	17	0001 0111
24	18	0001 1000
25	19	0001 1001
26	1A	0001 1010
27	1B	0001 1011
28	1C	0001 1100
29	1D	0001 1101
30	1E	0001 1110
31	1F	0001 1111

Decimal	Hexadecimal	Binary
32	20	0010 0000
33	21	0010 0001
34	22	0010 0010
35	23	0010 0011
36	24	0010 0100
37	25	0010 0101
38	26	0010 0110
39	27	0010 0111
40	28	0010 1000
41	29	0010 1001
42	2A	0010 1010
43	2B	0010 1011
44	2C	0010 1100
45	2D	0010 1101
46	2E	0010 1110
47	2F	0010 1111
48	30	0011 0000
49	31	0011 0001
50	32	0011 0010
51	33	0011 0011
52	34	0011 0100
53	35	0011 0101
54	36	0011 0110
55	37	0011 0111
56	38	0011 1000
57	39	0011 1001
58	3A	0011 1010
59	3B	0011 1011
60	3C	0011 1100
61	3D	0011 1101
62	3E	0011 1110
63	3F	0011 1111

Decimal	Hexadecimal	Binary
64	40	0100 0000
65	41	0100 0001
66	42	0100 0010
67	43	0100 0011
68	44	0100 0100
69	45	0100 0101
70	46	0100 0110
71	47	0100 0111
72	48	0100 1000
73	49	0100 1001
74	4A	0100 1010
75	4B	0100 1011
76	4C	0100 1100
77	4D	0100 1101
78	4E	0100 1110
79	4F	0100 1111
80	50	0101 0000
81	51	0101 0001
82	52	0101 0010
83	53	0101 0011
84	54	0101 0100
85	55	0101 0101
86	56	0101 0110
87	57	0101 0111
88	58	0101 1000
89	59	0101 1001
90	5A	0101 1010
91	5B	0101 1011
92	5C	0101 1100
93	5D	0101 1101
94	5E	0101 1110
95	5F	0101 1111

Decimal	Hexadecimal	Binary
96	60	0110 0000
97	61	0110 0001
98	62	0110 0010
99	63	0110 0011
100	64	0110 0100
101	65	0110 0101
102	66	0110 0110
103	67	0110 0111
104	68	0110 1000
105	69	0110 1001
106	6A	0110 1010
107	6B	0110 1011
108	6C	0110 1100
109	6D	0110 1101
110	6E	0110 1110
111	6F	0110 1111
112	70	0111 0000
113	71	0111 0001
114	72	0111 0010
115	73	0111 0011
116	74	0111 0100
117	75	0111 0101
118	76	0111 0110
119	77	0111 0111
120	78	0111 1000
121	79	0111 1001
122	7A	0111 1010
123	7B	0111 1011
124	7C	0111 1100
125	7D	0111 1101
126	7E	0111 1110
127	7F	0111 1111

- Except the table above, for example 144-159(decimal)/9nH/10010000-1001 1111(binary) denotes the Note On Message for each channel (1-16). 176-191/BnH/1011 0000-1011 1111 denotes the Control Change Message for each channel (1-16). 192-207/CnH/1100 0000-1100 1111 denotes the Program Change Message for each channel (1-16). 240/F0H/1111 0000 denotes the start of a Sys-tem Exclusive Message. 247/F7H/1111 0111 denotes the end of a System Exclusive Message.

- aaH (hexadecimal)/0aaaaaaa (binary) denotes the data address. The address contains High, Mid, and Low.
- bbH/0bbbbbbb denotes the byte count.
- ccH/0ccccccc denotes the check sum.
- ddH/0ddddddd denotes the data/value.

MIDI CHANNEL MESSAGE (1)

MIDI Events	Status byte		1st Data byte			2nd Data byte			Voice		[MIDI] MIDI Reception					MIDI Transmission					[Song Creator] PLAY		REC
	Status		Data	(HEX)	Parameter	Data	(HEX)	Parameter	Regular/ Drum/ Organ Voice	Mic/Vocal Harmony	Song	Right1 Right2 Right3 Left	Keyboard	Style	Extra	Right1 Right2 Right3 Left	M.Pad	Style	Song	Upper Lower	PLAY	REW	From panel (Right1/ Right2/ Right3/ Left)
Key Off [GM1] [GM2]	8nH	(n:Channel Number)	kk		Key no. (0-127)	vv		Velocity(0-127)	O	O (Harmony Channel)	O	O	O	O	O	X	X	O	O	X	O	X	X
Key On [GM1] [GM2]	9nH	(n:Channel Number)	kk		Key no. (0-127)	vv		Key On : vv=1-127 Key Off : vv=0	O	O (Harmony Channel)	O	O	O	O	O	●	O	O	O	●	O	X	O
Control Change	BnH		0	(00H)	Bank Select MSB [GM2]	0 0 8 8 8 64 104 104 118 119 120 121 126 127	(00H) (00H) (08H) (08H) (08H) (40H) (68H) (68H) (76H) (77H) (78H) (79H) (7EH) (7FH)	Normal S.Articulation voice Mega voice S.Articulation voice S.Articulation2 voice SFX voice Normal S.Articulation voice GS Rhythm GS Normal GM2 Rhythm GM2 Normal SFX kit Drum kit	O	X	O	O	O (Regist)	O	O	●	O	●	●	X	O	O	O
			1	(01H)	Modulation [GM1] [GM2]	0-127	(00H...7FH)	Data	O	X	O	O	O (All Keyboard parts)	O	O	●	O	O	O	●	O	O	O
			5	(05H)	Portamento Time [GM2]	0-127	(00H...7FH)	Data	O (Except S.Articulation Piano, Organ Flutes)	X	O	O	O (All Keyboard parts)	X	O	●	O	X	O	X	O	O	O
			6	(06H)	Data Entry MSB [GM2]	0-127	(00H...7FH)	Data	O	O (Harmony Channel)	O	O	O (All Keyboard parts)	O	O	●	O	O	O	X	O	X	O
			7	(07H)	Main Volume [GM1] [GM2]	0-127	(00H...7FH)	Data	O	O (A/D Part Receive Channel)	O	O	O (All Keyboard parts)	O	O	●	●	●	●	X	O	O	O
			10	(0AH)	Panpot [GM1] [GM2]	0-127	(00H...7FH)	L64...C...R63	O	O (A/D Part Receive Channel)	O	O	O (All Keyboard parts)	O	O	●	●	●	●	X	O	O	O
			11	(0BH)	Expression [GM1] [GM2]	0-127	(00H...7FH)	Data	O	X	O	O	O (All Keyboard parts)	O	O	●	●	●	●	●	O	O	O
			32	(20H)	Bank Select LSB [GM2]	0-127	(00H...7FH)	Data	O	X	O	O	O (Regist)	O	O	●	O	●	●	X	O	O	O
			38	(26H)	Data Entry LSB [GM2]	0-127	(00H...7FH)	Data	O	X	O	O	O (All Keyboard parts)	X	O	●	O	X	O	X	O	X	O
			64	(40H)	Sustain (Damper) [GM1] [GM2]	0-127	(00H...7FH)	Data	O	O (Harmony Channel)	O	O	O (All Keyboard parts)	X	O	●	O	X	O	●	O	O	O
			65	(41H)	Portamento [GM2]	0-127	(00H...7FH)	0...63, 64...127 (OFF, ON)	O (Except S.Articulation Piano, Organ Flutes)	X	O	O	O (All Keyboard parts)	X	O	●	O	X	O	●	O	O	O
			66	(42H)	Sostenuto [GM2]	0-127	(00H...7FH)	0...63, 64...127 (OFF, ON)	O	X	O	O	O (All Keyboard parts)	X	O	●	O	X	O	●	O	O	O
			67	(43H)	Soft Pedal [GM2]	0-127	(00H...7FH)	0...63, 64...127 (OFF, ON)	O	X	O	O	O (All Keyboard parts)	X	O	●	O	X	O	●	O	O	O
			71	(47H)	Harmonic Content [GM2]	0-127	(00H...7FH)	-64...0...+63	O	X	O	O	O (All Keyboard parts)	O	O	●	O	●	●	X	O	O	O
			72	(48H)	Release Time [GM2]	0-127	(00H...7FH)	-64...0...+63	O	X	O	O	O (All Keyboard parts)	O	O	●	O	O	O	X	O	O	O
			73	(49H)	Attack Time [GM2]	0-127	(00H...7FH)	-64...0...+63	O	X	O	O	O (All Keyboard parts)	O	O	●	O	O	O	X	O	O	O
			74	(4AH)	Brightness [GM2]	0-127	(00H...7FH)	-64...0...+63	O	X	O	O	O (All Keyboard parts)	O	O	●	O	●	●	X	O	O	O
			75	(4BH)	Decay Time [GM2]	0-127	(00H...7FH)	-64...0...+63	O	X	O	O	O (All Keyboard parts)	O	O	X	X	X	O	X	O	O	X
			76	(4CH)	Vibrato Rate [GM2]	0-127	(00H...7FH)	-64...0...+63	O	X	O	O	O (All Keyboard parts)	O	O	X	X	X	O	X	O	O	X
			77	(4DH)	Vibrato Depth [GM2]	0-127	(00H...7FH)	-64...0...+63	O	X	O	O	O (All Keyboard parts)	O	O	X	X	X	O	X	O	O	X
			78	(4EH)	Vibrato Delay [GM2]	0-127	(00H...7FH)	-64...0...+63	O	X	O	O	O (All Keyboard parts)	O	O	X	X	X	O	X	O	O	X
			80	(50H)	General Purpose Controller (Articulation 1)	0-127	(00H...7FH)	0 : OFF 127 : ON	O (SA/SA2 Voice Only)	X	O	X	X	X	X	●	X	O	O	X	O	O	O
			81	(51H)	General Purpose Controller (Articulation 2)	0-127	(00H...7FH)	0 : OFF 127 : ON	O (SA2 Voice Only)	X	O	X	X	X	X	●	X	O	O	X	O	O	O
			84	(54H)	Portamento Control	0-127	(00H...7FH)	Key no. (0-127)	O	X	O	O	X	O	O	O	O	●	O	X	O	X	O

● : Transmitted via panel operations and keyboard/controller performances.   O : Available

[GM1]...GM Required Parameter
[GM2]...GM Level2 Required Parameter

									[MIDI]												[Song Creator]		
MIDI Events	**Status byte**		**1st Data byte**			**2nd Data byte**			**Voice**		**MIDI Reception**					**MIDI Transmission**					**PLAY**		**REC**
	Status		**Data**	**(HEX)**	**Parameter**	**Data**	**(HEX)**	**Parameter**	**Regular/ Drum/ Organ Voice**	**Mic/Vocal Harmony**	**Song**	**Right1 Right2 Right3 Left**	**Keyboard**	**Style**	**Extra**	**Right1 Right2 Right3 Left**	**M.Pad**	**Style**	**Song**	**Upper Lower**	**PLAY**	**REW**	**From panel (Right1/ Right2/ Right3/ Left)**
			91	(5BH)	Effect1 Depth (Reverb Send Level) [GM2]	0-127	(00H...7FH)	Data	O	O (A/D Part Receive Channel)	O	O	O (All Keyboard parts)	O	O	●	●	●	●	X	O	O	O
			93	(5DH)	Effect3 Depth (Chorus Send Level) [GM2]	0-127	(00H...7FH)	Data	O	O (A/D Part Receive Channel)	O	O	O (All Keyboard parts)	O	O	●	●	●	●	X	O	O	O
			94	(5EH)	Effect4 Depth (Variation Send Level)	0-127	(00H...7FH)	Data	O	X	O	O	O (All Keyboard parts)	O	O	O	O	●	●	X	O	O	X
			96	(60H)	RPN Increment	-	-	The data byte is ignored.	O	O (Harmony Channel)	O	O	X	O	O	X	O	X	O	X	O	X	X
			97	(61H)	RPN Decrement	-	-	The data byte is ignored.	O	O (Harmony Channel)	O	O	X	O	O	X	O	X	O	X	O	X	X
			98	(62H)	NRPN LSB	0-127	(00H...7FH)	Data	O	X	O	O	X	O	O	●	O	O	O	X	O	O	O
			99	(63H)	NRPN MSB	0-127	(00H...7FH)	Data	O	X	O	O	X	O	O	●	O	O	O	X	O	O	O
			100	(64H)	RPN LSB [GM2]	0-127	(00H...7FH)	Data	O	O (Harmony Channel)	O	O	O (All Keyboard parts)	O	O	●	O	O	O	X	O	O	O
			101	(65H)	RPN MSB [GM2]	0-127	(00H...7FH)	Data	O	O (Harmony Channel)	O	O	O (All Keyboard parts)	O	O	●	O	O	O	X	O	O	O
Mode Message	BnH	(n:Channel Number)	120	(78H)	All Sound Off [GM2]	0	(00H)	Data	O	X	O	O	O (All Keyboard parts)	O	O	X	O	X	O	X	O	X	X
			121	(79H)	Reset All Controllers [GM1] [GM2]	0	(00H)	Data	O	X	O	X	X	X	X	X	O	X	O	X	O	X	X
			122	(7AH)	Local Control	0 127	(00H) (7FH)	OFF ON	-	-	O					X	X	X	X	X	X	X	X
			123	(7BH)	All Note Off [GM1] [GM2]	0	(00H)	Data	O	O (Harmony Channel)	O	O	O (All Keyboard parts)	O	O	X	O	X	O	X	O	X	X
			124	(7CH)	Omni Off [GM2]	0	(00H)	Data	O	X	O	X	X	X	X	X	O	X	O	X	O	X	X
			125	(7DH)	Omni On [GM2]	0	(00H)	Data	O	X	O	X	X	X	X	X	O	X	O	X	O	X	X
			126	(7EH)	Mono [GM2]	0-16	(00H...10H)	Data	O	X	O	X	X	X	X	X	O	X	O	X	O	X	X
			127	(7FH)	Poly [GM2]	0	(00H)	Data	O	X	O	X	X	X	X	X	O	X	O	X	O	X	X
Program Change [GM1] [GM2]	CnH	(n:Channel Number)	pp	(00H... 7FH)	Voice Number (0-127)	-	-	-	O	X	O	O	O (Right1)	O	O	●	O	●	●	X	O	O	O
Channel After Touch [GM1] [GM2]	DnH	(n:Channel Number)	vv	(00H... 7FH)	Data	-	-	-	O	X	O	O	O (All Keyboard parts)	X	O	●	O	X	O	●	O	X	O
Polyphonic After Touch	AnH	(n:Channel Number)	kk	(00H... 7FH)	Key no. (0-127)	vv	(00H...7FH)	Data	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
Pitch Bend Change [GM1] [GM2]	EnH	(n:Channel Number)	cc	(00H... 7FH)	LSB	dd	(00H...7FH)	MSB	O	O (Harmony Channel)	O	O	O (All Keyboard parts)	O	O	●	O	O	O	●	O	O	O
Realtime Message	F8H	MIDI Clock	-	-	-	-	-	-	-	-	O (Received when the Clock is set to MIDI A, MIDI B, USB1, or USB2.)					O (Transmitted when the Clock is set to Internal and the Transmit Clock is set to on.)					-	-	-
	FAH	Start	-	-	-	-	-	-	-	-	O (Received when the Clock is set to MIDI A, MIDI B, USB1, or USB2.)					O (Transmitted when the Transmit Clock is set to on.)					-	-	-
	FBH	Continue	-	-	-	-	-	-	-	-	X					X					-	-	-
	FCH	Stop	-	-	-	-	-	-	-	-	O (Received when the Clock is set to MIDI A, MIDI B, USB1, or USB2.)					O (Transmitted when the Transmit Clock is set to on.)					-	-	-
	FEH	Active Sense [GM2]	-	-	-	-	-	-	-	-	O					O					-	-	-
	FFH	System Reset	-	-	-	-	-	-	-	-	X					X					-	-	-

● : Transmitted via panel operations and keyboard/controller performances.   O : Available

About Mic/Vocal Harmony column:
Harmony Channel: The relevant parameters are received by the song part designated by the Effect's Harmony Channel Parameter.
A/D Part Receive Channel: The relevant parameters are received by the song part designated by the AD Part Receive Channel of the XG format.

[GM1]...GM Required Parameter
[GM2]...GM Level2 Required Parameter

MIDI CHANNEL MESSAGE (2)

NRPN

NRPN		Data Entry		Parameter	Data Range	[MIDI] Voice		MIDI Reception					MIDI Transmission					[Song Creator] PLAY		REC
MSB	LSB	MSB	LSB			Regular/ Drum/ Organ Voice	Mic/Vocal Harmony	Song	Right1 Right2 Right3 Left	Keyboard	Style	Extra	Right1 Right2 Right3 Left	M.Pad	Style	Song	Upper Lower	PLAY	REW	From panel (Right1/ Right2/ Right3/ Left)
01H	08H	mmH	--	Vibrato Rate	mm : 00H-40H-7FH (-64...0...+63)	O	X	O	O	X	O	O	●	O	O	O	X	O	O	O
01H	09H	mmH	--	Vibrato Depth	mm : 00H-40H-7FH (-64...0...+63)	O	X	O	O	X	O	O	●	O	O	O	X	O	O	O
01H	0AH	mmH	--	Vibrato Delay	mm : 00H-40H-7FH (-64...0...+63)	O	X	O	O	X	O	O	●	O	O	O	X	O	O	O
01H	20H	mmH	--	Low Pass Filter Cutoff Frequency	mm : 00H-40H-7FH (-64...0...+63)	O	X	O	X	X	O	X	X	O	X	O	X	O	O	X
01H	21H	mmH	--	Low Pass Filter Resonance	mm : 00H-40H-7FH (-64...0...+63)	O	X	O	X	X	O	X	X	O	X	O	X	O	O	X
01H	30H	mmH	--	EQ Bass Gain	mm : 00H-40H-7FH (-64...0...+63)	O	X	O	X	X	O	X	X	X	X	O	X	O	O	X
01H	31H	mmH	--	EQ Treble Gain	mm : 00H-40H-7FH (-64...0...+63)	O	X	O	X	X	O	X	X	X	X	O	X	O	O	X
01H	34H	mmH	--	EQ Bass Frequency	mm : 04H-28H (32...2.0k[Hz])	O	X	O	X	X	X	X	X	X	X	O	X	O	O	X
01H	35H	mmH	--	EQ Treble Frequency	mm : 1CH-3AH (500...16.0k[Hz])	O	X	O	X	X	X	X	X	X	X	O	X	O	O	X
01H	63H	mmH	--	EG Attack Time	mm : 00H-40H-7FH (-64...0...+63)	O	X	O	X	X	O	X	X	O	X	O	X	O	O	X
01H	64H	mmH	--	EG Decay Time	mm : 00H-40H-7FH (-64...0...+63)	O	X	O	O	X	O	O	●	O	O	O	X	O	O	O
01H	66H	mmH	--	EG Release	mm : 00H-40H-7FH (-64...0...+63)	O	X	O	X	X	O	X	X	O	X	O	X	O	O	X
14H	rrH	mmH	--	Drum Low Pass Filter Cutoff Frequency	rr : drum instrument note number mm : 00H-40H-7FH (-64...0...+63)	O (Drum Only)	X	O	X	X	X	X	X	X	O	O	X	O	X	X
15H	rrH	mmH	--	Drum Low Pass Filter Resonance	rr : drum instrument note number mm : 00H-40H-7FH (-64...0...+63)	O (Drum Only)	X	O	X	X	X	X	X	X	O	O	X	O	X	X
16H	rrH	mmH	--	Drum EG Attack Rate	rr : drum instrument note number mm : 00H-40H-7FH (-64...0...+63)	O (Drum Only)	X	O	X	X	X	X	X	X	O	O	X	O	X	X
17H	rrH	mmH	--	Drum EG Decay Rate	rr : drum instrument note number mm : 00H-40H-7FH (-64...0...+63)	O (Drum Only)	X	O	X	X	X	X	X	X	O	O	X	O	X	X
18H	rrH	mmH	--	Drum Pitch Coarse	rr : drum instrument note number mm : 00H-40H-7FH (-64...0...+63)	O (Drum Only)	X	O	X	X	X	X	X	X	O	O	X	O	X	X
19H	rrH	mmH	--	Drum Pitch Fine	rr : drum instrument note number mm : 00H-40H-7FH (-64...0...+63)	O (Drum Only)	X	O	X	X	X	X	X	X	O	O	X	O	X	X
1AH	rrH	mmH	--	Drum Level	rr : drum instrument note number mm : 00H-7FH (0...127)	O (Drum Only)	X	O	X	X	X	X	X	X	O	O	X	O	X	X
1CH	rrH	mmH	--	Drum Pan	rr : drum instrument note number mm : 00H, 01H-40H-7FH (RND, L63...C...R63)	O (Drum Only)	X	O	X	X	X	X	X	X	O	O	X	O	X	X
1DH	rrH	mmH	--	Drum Reverb Send Level	rr : drum instrument note number mm : 00H-7FH (0...127)	O (Drum Only)	X	O	X	X	X	X	X	X	O	O	X	O	X	X
1EH	rrH	mmH	--	Drum Chorus Send Level	rr : drum instrument note number mm : 00H-7FH (0...127)	O (Drum Only)	X	O	X	X	X	X	X	X	O	O	X	O	X	X
1FH	rrH	mmH	--	Drum Variation Send Level	rr : drum instrument note number mm : 00H-7FH (0...127) (Variation Connection= SYSTEM) mm : 00H, 01H-7FH (OFF, ON) (Variation Connection= INSERTION)	O (Drum Only)	X	O	X	X	X	X	X	X	O	O	X	O	X	X
30H	rrH	mmH	--	Drum EQ Bass Gain	rr : drum instrument note number mm : 00H-7FH (0...127)	X	X	X	X	X	X	X	X	X	X	O	X	X	X	X
31H	rrH	mmH	--	Drum EQ Treble Gain	rr : drum instrument note number mm : 00H-7FH (0...127)	X	X	X	X	X	X	X	X	X	X	O	X	X	X	X
34H	rrH	mmH	--	Drum EQ Bass Frequency	rr : drum instrument note number mm : 04H-28H (32...2.0[Hz])	X	X	X	X	X	X	X	X	X	X	O	X	X	X	X
35H	rrH	mmH	--	Drum EQ Treble Frequency	rr : drum instrument note number mm : 1CH-3AH (500...16.0[Hz])	X	X	X	X	X	X	X	X	X	X	O	X	X	X	X

● : Transmitted via panel operations and keyboard/controller performances.   O : Available

NRPN MSB: 14H-35H (for drums) message is accepted as long as the channel is set with a drum voice.
Data Entry LSB: Ignored.

RPN

[MIDI] [Song Creator]

RPN		Data Entry		Parameter	Data Range	Voice		MIDI Reception					MIDI Transmission					PLAY		REC
MSB	LSB	MSB	LSB			Regular/ Drum/ Organ Voice	Mic/Vocal Harmony	Song	Right1 Right2 Right3 Left	Keyboard	Style	Extra	Right1 Right2 Right3 Left	M.Pad	Style	Song	Upper Lower	PLAY	REW	From panel (Right1/ Right2/ Right3/ Left)
00H	00H	mmH	--	Pitch Bend Sensitivity [GM1][GM2]	mm : 00H-18H (0...+24 [semitones])	O	O (Harmony Channel)	O	O	O (All Keyboard parts)	O	O	●	O	O	O	X	O	O	O
00H	01H	mmH	llH	Fine Tune [GM1][GM2]	mm ll : 00H 00H -100[cent] ... mm ll : 40H 00H 0[cent] ... mm ll : 7FH 7FH 100[cent]	O	X	O	O	O (All Keyboard parts)	O	O	●	O	O	O	X	O	O	O
00H	02H	mmH	--	Coarse Tune [GM1][GM2]	mm : 28H-40H-58H (-24...0...+24[semitones])	O	X	O	O	O (All Keyboard parts)	O	O	X	O	O	O	X	O	O	X
00H	05H	mmH	llH	Modulation Sensitivity [GM2]	mm : Specified in semitone steps ll : Specified in 100/128 cent steps	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
7FH	7FH	--	--	Null [GM2]	-	O	O	O	O	O (All Keyboard parts)	O	O	X	O	O	O	X	O	X	X

● : Transmitted via panel operations and keyboard/controller performances. O : Available

About Mic/Vocal Harmony column:
The relevant parameters are received by the song part designated by the Effect's Harmony Channel Parameter or Melody Channel Parameter.

[GM1]...GM Required Parameter
[GM2]...GM Level2 Required Parameter

XG PARAMETER CHANGE TABLE

* Not received when Receive System Exclusive Message Parameters is set to off.
* Not transmitted when Transmit System Exclusive Message Parameters is set to off.

MIDI Parameter Change table (XG SYSTEM)

[MIDI] [Song Creator]

Address (H)			Size (H)	Data (H)	Parameter	Description	XG Default (H)	Voice		MIDI Reception					MIDI Transmission					PLAY		REC
								Regular/ Drum/ Organ Voice	Mic/ Vocal Harmony	Song	Right1 Right2 Right3 Left	Keyboard	Style	Extra	Right1 Right2 Right3 Left	M.Pad	Style	Song	Upper Lower	PLAY	REW	From panel (Right1/ Right2/ Right3/ Left)
00	00	00	4	00-0F	MASTER TUNE	-102.4...0...+102.3[cent]	*Panel setting value	O	O	O					●					O	X	X
		01		00-0F		1st bit3-0→bit15-12																
		02		00-0F		2nd bit3-0→bit11-8																
		03		00-0F		3rd bit3-0→bit7-4 4th bit3-0→bit3-0																
		04	1	00-7F	MASTER VOLUME	0...127	7F	O	X	O (Available for extra parts of a song)					O					O	O	X
		05	1	00-7F	MASTER ATTENUATOR	0...127	00	X	X	X					X					X	X	X
		06	1	28-58	TRANSPOSE	-24...0...+24 [semitones]	40	O	O	O (Available for extra parts of a song)					O					O	O	X
		7D	1	N	DRUM SETUP RESET	N:Drum setup number	-	O (Drum Only)	X	O (Available for extra parts of a song)					O					O	X	X
		7E	1	00	XG SYSTEM ON	00=XG system ON	-	O	X	O (Available for extra parts of a song)					O					O	X	O
		7F	1	00	ALL PARAMETER RESET	00=ON	-	O	X	O (Available for extra parts of a song)					O					O	X	X

TOTAL SIZE 07

● : Transmitted via panel operations O : Available

MIDI Parameter Change table (SYSTEM INFORMATION)

[MIDI] [Song Creator]

Address (H)			Size (H)	Data (H)	Parameter	Description	Voice		MIDI Reception					MIDI Transmission					PLAY		REC
							Regular/ Drum/ Organ Voice	Mic/ Vocal Harmony	Song	Right1 Right2 Right3 Left	Keyboard	Style	Extra	Right1 Right2 Right3 Left	M.Pad	Style	Song	Upper Lower	PLAY	REW	From panel (Right1/ Right2/ Right3/ Left)
01	00	00	E	20-7F	Model Name 1	32...127(ASCII CHARACTER)	-		-					O (Available only when receiving requests via MIDI)					-	-	-
		...		...	...	...															
		0D		20-7F	Model Name 14	32...127(ASCII CHARACTER)															
		0E	1		NOT USED																
		0F	1		NOT USED																

TOTAL SIZE 10

Transmitted in response to Dump Request. Not received.

MIDI Parameter Change table (EFFECT1)

[MIDI] [Song Creator]

Address (H)			Size (H)	Data (H)	Parameter	Description	XG Default (H)	Voice		MIDI Reception					MIDI Transmission					PLAY		REC
								Regular/ Drum/ Organ Voice	Mic/Vocal Harmony	Song	Right1 Right2 Right3 Left	Keyboard	Style	Extra	Right1 Right2 Right3 Left	M.Pad	Style	Song	Upper	PLAY	REW	From panel (Right1/ Right2/ Right3/ Left)
02	01	00	2	00-7F 00-7F	REVERB TYPE MSB REVERB TYPE LSB	Refer to Effect Parameter List Refer to Effect Parameter List	01(=HALL1) 00	O	O	O					●					O	O	O
		02	1	00-7F	REVERB PARAMETER 1	Refer to Effect Parameter List	Depends on Reverb Type	O	O	O					●					O	O	O
		03	1	00-7F	REVERB PARAMETER 2	Refer to Effect Parameter List	Depends on Reverb Type	O	O	O					●					O	O	O
		04	1	00-7F	REVERB PARAMETER 3	Refer to Effect Parameter List	Depends on Reverb Type	O	O	O					●					O	O	O
		05	1	00-7F	REVERB PARAMETER 4	Refer to Effect Parameter List	Depends on Reverb Type	O	O	O					●					O	O	O
		06	1	00-7F	REVERB PARAMETER 5	Refer to Effect Parameter List	Depends on Reverb Type	O	O	O					●					O	O	O
		07	1	00-7F	REVERB PARAMETER 6	Refer to Effect Parameter List	Depends on Reverb Type	O	O	O					●					O	O	O
		08	1	00-7F	REVERB PARAMETER 7	Refer to Effect Parameter List	Depends on Reverb Type	O	O	O					●					O	O	O
		09	1	00-7F	REVERB PARAMETER 8	Refer to Effect Parameter List	Depends on Reverb Type	O	O	O					●					O	O	O
		0A	1	00-7F	REVERB PARAMETER 9	Refer to Effect Parameter List	Depends on Reverb Type	O	O	O					●					O	O	O
		0B	1	00-7F	REVERB PARAMETER 10	Refer to Effect Parameter List	Depends on Reverb Type	O	O	O					●					O	O	O
		0C	1	00-7F	REVERB RETURN	-∞dB...0dB...+6dB (0...64...127)	40	O	O	O					●					O	O	O
		0D	1	01-7F	REVERB PAN	L63...C...R63	40	O	O	O					O					O	O	X

TOTAL SIZE 0E

Address (H)			Size (H)	Data (H)	Parameter	Description	XG Default (H)	Voice		MIDI Reception					MIDI Transmission					PLAY		REC
02	01	10	1	00-7F	REVERB PARAMETER 11	Refer to Effect Parameter List	Depends on Reverb Type	O	O	O					●					O	O	O
		11	1	00-7F	REVERB PARAMETER 12	Refer to Effect Parameter List	Depends on Reverb Type	O	O	O					●					O	O	O
		12	1	00-7F	REVERB PARAMETER 13	Refer to Effect Parameter List	Depends on Reverb Type	O	O	O					●					O	O	O
		13	1	00-7F	REVERB PARAMETER 14	Refer to Effect Parameter List	Depends on Reverb Type	O	O	O					●					O	O	O
		14	1	00-7F	REVERB PARAMETER 15	Refer to Effect Parameter List	Depends on Reverb Type	O	O	O					●					O	O	O
		15	1	00-7F	REVERB PARAMETER 16	Refer to Effect Parameter List	Depends on Reverb Type	O	O	O					●					O	O	O

TOTAL SIZE 06

● : Transmitted via panel operations O : Available

Address (H)			Size (H)	Data (H)	Parameter	Description	XG Default (H)	[MIDI] Voice: Regular/ Drum/ Organ Voice	Voice: Mic/Vocal Harmony	MIDI Reception: Song / Right1 Right2 Right3 Left / Keyboard / Style / Extra	MIDI Transmission: Right1 Right2 Right3 Left / M.Pad / Style / Song / Upper Lower	[Song Creator] PLAY: PLAY	PLAY: REW	REC: From panel (Right1/ Right2/ Right3/ Left)
02	01	20	2	00-7F	CHORUS TYPE MSB	Refer to Effect Parameter List	41(=CHORUS1)	O	O	O	●	O	O	O
				00-7F	CHORUS TYPE LSB	Refer to Effect Parameter List	00							
		22	1	00-7F	CHORUS PARAMETER 1	Refer to Effect Parameter List	Depends on Chorus Type	O	O	O	●	O	O	O
		23	1	00-7F	CHORUS PARAMETER 2	Refer to Effect Parameter List	Depends on Chorus Type	O	O	O	●	O	O	O
		24	1	00-7F	CHORUS PARAMETER 3	Refer to Effect Parameter List	Depends on Chorus Type	O	O	O	●	O	O	O
		25	1	00-7F	CHORUS PARAMETER 4	Refer to Effect Parameter List	Depends on Chorus Type	O	O	O	●	O	O	O
		26	1	00-7F	CHORUS PARAMETER 5	Refer to Effect Parameter List	Depends on Chorus Type	O	O	O	●	O	O	O
		27	1	00-7F	CHORUS PARAMETER 6	Refer to Effect Parameter List	Depends on Chorus Type	O	O	O	●	O	O	O
		28	1	00-7F	CHORUS PARAMETER 7	Refer to Effect Parameter List	Depends on Chorus Type	O	O	O	●	O	O	O
		29	1	00-7F	CHORUS PARAMETER 8	Refer to Effect Parameter List	Depends on Chorus Type	O	O	O	●	O	O	O
		2A	1	00-7F	CHORUS PARAMETER 9	Refer to Effect Parameter List	Depends on Chorus Type	O	O	O	●	O	O	O
		2B	1	00-7F	CHORUS PARAMETER 10	Refer to Effect Parameter List	Depends on Chorus Type	O	O	O	●	O	O	O
		2C	1	00-7F	CHORUS RETURN	-∞dB...0dB...+6dB (0...64...127)	40	O	O	O	●	O	O	O
		2D	1	01-7F	CHORUS PAN	L63...C...R63	40	O	O	O	O	O	O	X
		2E	1	00-7F	SEND CHORUS TO REVERB	-∞dB...0dB...+6dB (0...64...127)	00	O	O	O	O	O	O	X

TOTAL SIZE 0F

Address (H)			Size (H)	Data (H)	Parameter	Description	XG Default (H)	Voice: Regular/ Drum/ Organ Voice	Voice: Mic/Vocal Harmony	MIDI Reception	MIDI Transmission	PLAY	REW	REC
02	01	30	1	00-7F	CHORUS PARAMETER 11	Refer to Effect Parameter List	Depends on Chorus Type	O	O	O	●	O	O	O
		31	1	00-7F	CHORUS PARAMETER 12	Refer to Effect Parameter List	Depends on Chorus Type	O	O	O	●	O	O	O
		32	1	00-7F	CHORUS PARAMETER 13	Refer to Effect Parameter List	Depends on Chorus Type	O	O	O	●	O	O	O
		33	1	00-7F	CHORUS PARAMETER 14	Refer to Effect Parameter List	Depends on Chorus Type	O	O	O	●	O	O	O
		34	1	00-7F	CHORUS PARAMETER 15	Refer to Effect Parameter List	Depends on Chorus Type	O	O	O	●	O	O	O
		35	1	00-7F	CHORUS PARAMETER 16	Refer to Effect Parameter List	Depends on Chorus Type	O	O	O	●	O	O	O

TOTAL SIZE 06

Address (H)			Size (H)	Data (H)	Parameter	Description	XG Default (H)	[MIDI] Voice: Regular/ Drum/ Organ Voice	Voice: Mic/Vocal Harmony	MIDI Reception: Song / Right1 Right2 Right3 Left / Keyboard / Style / Extra	MIDI Transmission: Right1 Right2 Right3 Left / M.Pad / Style / Song / Upper Lower	[Song Creator] PLAY: PLAY	PLAY: REW	REC: From panel (Right1/ Right2/ Right3/ Left)
02	01	40	2	00-7F	VARIATION TYPE MSB	Refer to Effect Parameter List	05(=DELAY L,C,R)	O	O	O	●	O	O	O
				00-7F	VARIATION TYPE LSB	Refer to Effect Parameter List	00							
		42	2	00-7F	VARIATION PARAMETER 1 MSB	Refer to Effect Parameter List	Depends on Variation Type	O	O	O	●	O	O	O
				00-7F	VARIATION PARAMETER 1 LSB	Refer to Effect Parameter List								
		44	2	00-7F	VARIATION PARAMETER 2 MSB	Refer to Effect Parameter List	Depends on Variation Type	O	O	O	●	O	O	O
				00-7F	VARIATION PARAMETER 2 LSB	Refer to Effect Parameter List								
		46	2	00-7F	VARIATION PARAMETER 3 MSB	Refer to Effect Parameter List	Depends on Variation Type	O	O	O	●	O	O	O
				00-7F	VARIATION PARAMETER 3 LSB	Refer to Effect Parameter List								
		48	2	00-7F	VARIATION PARAMETER 4 MSB	Refer to Effect Parameter List	Depends on Variation Type	O	O	O	●	O	O	O
				00-7F	VARIATION PARAMETER 4 LSB	Refer to Effect Parameter List								
		4A	2	00-7F	VARIATION PARAMETER 5 MSB	Refer to Effect Parameter List	Depends on Variation Type	O	O	O	●	O	O	O
				00-7F	VARIATION PARAMETER 5 LSB	Refer to Effect Parameter List								
		4C	2	00-7F	VARIATION PARAMETER 6 MSB	Refer to Effect Parameter List	Depends on Variation Type	O	O	O	●	O	O	O
				00-7F	VARIATION PARAMETER 6 LSB	Refer to Effect Parameter List								
		4E	2	00-7F	VARIATION PARAMETER 7 MSB	Refer to Effect Parameter List	Depends on Variation Type	O	O	O	●	O	O	O
				00-7F	VARIATION PARAMETER 7 LSB	Refer to Effect Parameter List								
		50	2	00-7F	VARIATION PARAMETER 8 MSB	Refer to Effect Parameter List	Depends on Variation Type	O	O	O	●	O	O	O
				00-7F	VARIATION PARAMETER 8 LSB	Refer to Effect Parameter List								
		52	2	00-7F	VARIATION PARAMETER 9 MSB	Refer to Effect Parameter List	Depends on Variation Type	O	O	O	●	O	O	O
				00-7F	VARIATION PARAMETER 9 LSB	Refer to Effect Parameter List								
		54	2	00-7F	VARIATION PARAMETER 10 MSB	Refer to Effect Parameter List	Depends on Variation Type	O	O	O	●	O	O	O
				00-7F	VARIATION PARAMETER 10 LSB	Refer to Effect Parameter List								
		56	1	00-7F	VARIATION RETURN	-∞dB...0dB...+6dB (0...64...127)	40	O	O	O	●	O	O	O
		57	1	01-7F	VARIATION PAN	L63...C...R63	40	O	O	O	O	O	O	X
		58	1	00-7F	SEND VARIATION TO REVERB	-∞dB...0dB...+6dB (0...64...127)	00	O	O	O	O	O	O	X
		59	1	00-7F	SEND VARIATION TO CHORUS	-∞dB...0dB...+6dB (0...64...127)	00	O	O	O	O	O	O	X
		5A	1	00-01	VARIATION CONNECTION	INSERTION, SYSTEM	00	O	O	O	●	O	O	O
		5B	1	00-7F	VARIATION PART NUMBER	Reception : Part1...16(0...15) Transmission : Part1...16(0...15) AD(64) OFF(127)	7F	O	O	O	●	O	O	O
		5C	1	00-7F	MW VARIATION CONTROL DEPTH	-64...0...+63	40	O	O	O	O	O	O	X
		5D	1	00-7F	BEND VARIATION CONTROL DEPTH	-64...0...+63	40	O	O	O	O	O	O	X
		5E	1	00-7F	CAT VARIATION CONTROL DEPTH	-64...0...+63	40	O	O	O	O	O	O	X
		5F	1	00-7F	AC1 VARIATION CONTROL DEPTH	-64...0...+63	40	O	O	O	O	O	O	X
		60	1	00-7F	AC2 VARIATION CONTROL DEPTH	-64...0...+63	40	O	O	O	O	O	O	X

TOTAL SIZE 21

[MIDI] [Song Creator]

Address (H)			Size (H)	Data (H)	Parameter	Description	XG Default (H)	Voice: Regular/ Drum/ Organ Voice	Voice: Mic/Vocal Harmony	MIDI Reception (Song / Right1 Right2 Right3 Left / Keyboard / Style / Extra)	MIDI Transmission (Right1 Right2 Right3 Left / M.Pad / Style / Song / Upper Lower)	PLAY: PLAY	PLAY: REW	REC: From panel (Right1/ Right2/ Right3/ Left)
02	01	70	1	00-7F	VARIATION PARAMETER 11	Refer to Effect Parameter List	Depends on Variation Type	O	O	O	●	O	O	O
		71	1	00-7F	VARIATION PARAMETER 12	Refer to Effect Parameter List	Depends on Variation Type	O	O	O	●	O	O	O
		72	1	00-7F	VARIATION PARAMETER 13	Refer to Effect Parameter List	Depends on Variation Type	O	O	O	●	O	O	O
		73	1	00-7F	VARIATION PARAMETER 14	Refer to Effect Parameter List	Depends on Variation Type	O	O	O	●	O	O	O
		74	1	00-7F	VARIATION PARAMETER 15	Refer to Effect Parameter List	Depends on Variation Type	O	O	O	●	O	O	O
		75	1	00-7F	VARIATION PARAMETER 16	Refer to Effect Parameter List	Depends on Variation Type	O	O	O	●	O	O	O

TOTAL SIZE 06

● : Transmitted via panel operations O : Available

MIDI Parameter Change table (MULTI EQ)

[MIDI] [Song Creator]

Address (H)			Size (H)	Data (H)	Parameter	Description		Voice: Regular/ Drum/ Organ Voice	Voice: Mic/Vocal Harmony	MIDI Reception (Song / Right1 Right2 Right3 Left / Keyboard / Style / Extra)	MIDI Transmission (Right1 Right2 Right3 Left / M.Pad / Style / Song / Upper Lower)	PLAY: PLAY	PLAY: REW	REC: From panel (Right1/ Right2/ Right3/ Left)
02	40	00	1	00-04	EQ TYPE	flat, jazz, pops, rock, classic	* The MULTI EQ Parameter cannot be reset to its factory setting with XG SYSTEM ON.	O	O	O	O	O	X	X
		01	1	34-4C	EQ GAIN1	-12...0...+12[dB]		O	O	O	●	O	X	X
		02	1	04-28	EQ FREQUENCY1	32...2.0k[Hz]		O	O	O	●	O	X	X
		03	1	01-78	EQ Q1	0.1...12.0		O	O	O	●	O	X	X
		04	1	00-01	EQ SHAPE1	shelving, peaking		O	O	O	O	O	X	X
		05	1	34-4C	EQ GAIN2	-12...0...+12[dB]		O	O	O	●	O	X	X
		06	1	0E-36	EQ FREQUENCY2	100...10.0k[Hz]		O	O	O	●	O	X	X
		07	1	01-78	EQ Q2	0.1...12.0		O	O	O	●	O	X	X
		08	1		NOT USED			-	-	-	-	-	-	-
		09	1	34-4C	EQ GAIN3	-12...0...+12[dB]		O	O	O	●	O	X	X
		0A	1	0E-36	EQ FREQUENCY3	100...10.0k[Hz]		O	O	O	●	O	X	X
		0B	1	01-78	EQ Q3	0.1...12.0		O	O	O	●	O	X	X
		0C	1		NOT USED			-	-	-	-	-	-	-
		0D	1	34-4C	EQ GAIN4	-12...0...+12[dB]		O	O	O	●	O	X	X
		0E	1	0E-36	EQ FREQUENCY4	100...10.0k[Hz]		O	O	O	●	O	X	X
		0F	1	01-78	EQ Q4	0.1...12.0		O	O	O	●	O	X	X
		10	1		NOT USED			-	-	-	-	-	-	-
		11	1	34-4C	EQ GAIN5	-12...0...+12[dB]		O	O	O	●	O	X	X
		12	1	1C-3A	EQ FREQUENCY5	0.5k...16.0k[Hz]		O	O	O	●	O	X	X
		13	1	01-78	EQ Q5	0.1...12.0		O	O	O	●	O	X	X
		14	1	00-01	EQ SHAPE5	shelving, peaking		O	O	O	O	O	X	X

TOTAL SIZE 15

● : Transmitted via panel operations O : Available

MIDI Parameter Change table (EFFECT2)

[MIDI] [Song Creator]

Address (H)			Size (H)	Data (H)	Parameter	Description		Voice: Regular/ Drum/ Organ Voice	Voice: Mic/Vocal Harmony	MIDI Reception (Song / Right1 Right2 Right3 Left / Keyboard / Style / Extra)	MIDI Transmission (Right1 Right2 Right3 Left / M.Pad / Style / Song / Upper Lower)	PLAY: PLAY	PLAY: REW	REC: From panel (Right1/ Right2/ Right3/ Left)
03	n	00	2	00-7F 00-7F	INSERTION EFFECT TYPE MSB INSERTION EFFECT TYPE LSB	Refer to Effect Parameter List Refer to Effect Parameter List	* The EFFECT2 Parameter cannot be reset to its factory setting with XG SYSTEM ON.	O	O	O	●	O	O	O
		02	1	00-7F	INSERTION EFFECT PARAMETER 1	Refer to Effect Parameter List		O	O	O	●	O	O	O
		03	1	00-7F	INSERTION EFFECT PARAMETER 2	Refer to Effect Parameter List		O	O	O	●	O	O	O
		04	1	00-7F	INSERTION EFFECT PARAMETER 3	Refer to Effect Parameter List		O	O	O	●	O	O	O
		05	1	00-7F	INSERTION EFFECT PARAMETER 4	Refer to Effect Parameter List		O	O	O	●	O	O	O
		06	1	00-7F	INSERTION EFFECT PARAMETER 5	Refer to Effect Parameter List		O	O	O	●	O	O	O
		07	1	00-7F	INSERTION EFFECT PARAMETER 6	Refer to Effect Parameter List		O	O	O	●	O	O	O
		08	1	00-7F	INSERTION EFFECT PARAMETER 7	Refer to Effect Parameter List		O	O	O	●	O	O	O
		09	1	00-7F	INSERTION EFFECT PARAMETER 8	Refer to Effect Parameter List		O	O	O	●	O	O	O
		0A	1	00-7F	INSERTION EFFECT PARAMETER 9	Refer to Effect Parameter List		O	O	O	●	O	O	O
		0B	1	00-7F	INSERTION EFFECT PARAMETER 10	Refer to Effect Parameter List		O	O	O	●	O	O	O
		0C	1	00-7F	INSERTION EFFECT PART NUMBER	Reception : Part1...16(0...15) Transmission : Part1...16(0...15) AD(64) OFF(127)		O	O	O	●	O	O	O
		0D	1	00-7F	MW INSERTION CONTROL DEPTH	-64...0...+63		O	O	O	O	O	O	X
		0E	1	00-7F	BEND INSERTION CONTROL DEPTH	-64...0...+63		O	O	O	O	O	O	X
		0F	1	00-7F	CAT INSERTION CONTROL DEPTH	-64...0...+63		O	O	O	O	O	O	X
		10	1	00-7F	AC1 INSERTION CONTROL DEPTH	-64...0...+63		O	O	O	O	O	O	X
		11	1	00-7F	AC2 INSERTION CONTROL DEPTH	-64...0...+63		O	O	O	O	O	O	X

TOTAL SIZE 12

[MIDI] [Song Creator]

Address (H)			Size (H)	Data (H)	Parameter	Description		Voice: Regular/ Drum/ Organ Voice	Voice: Mic/Vocal Harmony	MIDI Reception: Song	MIDI Reception: Right1 Right2 Right3 Left	MIDI Reception: Keyboard	MIDI Reception: Style	MIDI Reception: Extra	MIDI Transmission: Right1 Right2 Right3 Left	MIDI Transmission: M.Pad	MIDI Transmission: Style	MIDI Transmission: Song	MIDI Transmission: Upper Lower	PLAY: PLAY	PLAY: REW	REC: From panel (Right1/ Right2/ Right3/ Left)
		20	1	00-7F	INSERTION EFFECT PARAMETER 11	Refer to Effect Parameter List	* The EFFECT2 Parameter cannot be reset to its factory setting with XG SYSTEM ON.	O	O			O					●			O	O	O
		21	1	00-7F	INSERTION EFFECT PARAMETER 12	Refer to Effect Parameter List		O	O			O					●			O	O	O
		22	1	00-7F	INSERTION EFFECT PARAMETER 13	Refer to Effect Parameter List		O	O			O					●			O	O	O
		23	1	00-7F	INSERTION EFFECT PARAMETER 14	Refer to Effect Parameter List		O	O			O					●			O	O	O
		24	1	00-7F	INSERTION EFFECT PARAMETER 15	Refer to Effect Parameter List		O	O			O					●			O	O	O
		25	1	00-7F	INSERTION EFFECT PARAMETER 16	Refer to Effect Parameter List		O	O			O					●			O	O	O

TOTAL SIZE 6

		30	2	00-7F	INSERTION EFFECT PARAMETER 1 MSB	Refer to Effect Parameter List	* The EFFECT2 Parameter cannot be reset to its factory setting with XG SYSTEM ON.	O	O			O					●			O	O	O
				00-7F	INSERTION EFFECT PARAMETER 1 LSB	Refer to Effect Parameter List																
		32	2	00-7F	INSERTION EFFECT PARAMETER 2 MSB	Refer to Effect Parameter List		O	O			O					●			O	O	O
				00-7F	INSERTION EFFECT PARAMETER 2 LSB	Refer to Effect Parameter List																
		34	2	00-7F	INSERTION EFFECT PARAMETER 3 MSB	Refer to Effect Parameter List		O	O			O					●			O	O	O
				00-7F	INSERTION EFFECT PARAMETER 3 LSB	Refer to Effect Parameter List																
		36	2	00-7F	INSERTION EFFECT PARAMETER 4 MSB	Refer to Effect Parameter List		O	O			O					●			O	O	O
				00-7F	INSERTION EFFECT PARAMETER 4 LSB	Refer to Effect Parameter List																
		38	2	00-7F	INSERTION EFFECT PARAMETER 5 MSB	Refer to Effect Parameter List		O	O			O					●			O	O	O
				00-7F	INSERTION EFFECT PARAMETER 5 LSB	Refer to Effect Parameter List																
		3A	2	00-7F	INSERTION EFFECT PARAMETER 6 MSB	Refer to Effect Parameter List		O	O			O					●			O	O	O
				00-7F	INSERTION EFFECT PARAMETER 6 LSB	Refer to Effect Parameter List																
		3C	2	00-7F	INSERTION EFFECT PARAMETER 7 MSB	Refer to Effect Parameter List		O	O			O					●			O	O	O
				00-7F	INSERTION EFFECT PARAMETER 7 LSB	Refer to Effect Parameter List																
		3E	2	00-7F	INSERTION EFFECT PARAMETER 8 MSB	Refer to Effect Parameter List		O	O			O					●			O	O	O
				00-7F	INSERTION EFFECT PARAMETER 8 LSB	Refer to Effect Parameter List																
		40	2	00-7F	INSERTION EFFECT PARAMETER 9 MSB	Refer to Effect Parameter List		O	O			O					●			O	O	O
				00-7F	INSERTION EFFECT PARAMETER 9 LSB	Refer to Effect Parameter List																
		42	2	00-7F	INSERTION EFFECT PARAMETER 10 MSB	Refer to Effect Parameter List		O	O			O					●			O	O	O
				00-7F	INSERTION EFFECT PARAMETER 10 LSB	Refer to Effect Parameter List																

TOTAL SIZE 14

● : Transmitted via panel operations O : Available

The second byte of the address is considered as an Insertion effect number.
n : insertion effect number (n=0-5)

For effect types that do not require MSB, the Parameters for Address 02-0B will be received and the Parameters for Address 30-42 will not be received.
For effect types that require MSB, the Parameters for Address 30-42 will be received and the Parameters for Address 02-0B will not be received.
Type MSB of the effect types that require Parameter MSB are: 5, 6, 7, 8, 95, 96, 97, 98, 104.
When Bulk Dumps that include Effect Type data are transmitted, the Parameters for Address 02-0B will always be transmitted. But, effects that require MSB, when the bulk dump is received the Parameters for Address 02-0B will not be received.

MIDI Parameter Change table (SPECIAL EFFECT)

[MIDI] [Song Creator]

Address (H)			Size (H)	Data (H)	Parameter	Description		Voice: Regular/ Drum/ Organ Voice	Voice: Mic/Vocal Harmony	MIDI Reception: Song	MIDI Reception: Right1 Right2 Right3 Left	MIDI Reception: Keyboard	MIDI Reception: Style	MIDI Reception: Extra	MIDI Transmission: Right1 Right2 Right3 Left	MIDI Transmission: M.Pad	MIDI Transmission: Style	MIDI Transmission: Song	MIDI Transmission: Upper Lower	PLAY: PLAY	PLAY: REW	REC: From panel (Right1/ Right2/ Right3/ Left)
04	00	00	2	00-7F	VOCAL HARMONY TYPE MSB	Vocal Haomony(12), Synth Vocoder(13), Vocoder XG(89), Chordal XG(90), Detune XG(91), Chromatic XG(92), Thru(0...11, 14...88, 93...127)	* The SPECIAL EFFECT Parameter cannot be reset to its factory setting with XG SYSTEM ON.	X	O			O					●			O	O	X
				00-7F	VOCAL HARMONY TYPE LSB																	
		02	1	00-7F	VOCAL HARMONY PARAMETER 1			X	O			O					●			O	O	X
		03	1	00-7F	VOCAL HARMONY PARAMETER 2			X	O			O					●			O	O	X
		04	1	00-7F	VOCAL HARMONY PARAMETER 3			X	O			O					●			O	O	X
		05	1	00-7F	VOCAL HARMONY PARAMETER 4			X	O			O					●			O	O	X
		06	1	00-7F	VOCAL HARMONY PARAMETER 5			X	O			O					O			O	O	X
		07	1	00-7F	VOCAL HARMONY PARAMETER 6			X	O			O					O			O	O	X

[MIDI] [Song Creator]

Address (H)			Size (H)	Data (H)	Parameter	Description		Voice		MIDI Reception					MIDI Transmission					PLAY		REC
								Regular/ Drum/ Organ Voice	Mic/Vocal Harmony	Song	Right1 Right2 Right3 Left	Keyboard	Style	Extra	Right1 Right2 Right3 Left	M.Pad	Style	Song	Upper Lower	PLAY	REW	From panel (Right1/ Right2/ Right3/ Left)
		08	1	00-7F	VOCAL HARMONY PARAMETER 7		* The SPECIAL EFFECT Parameter cannot be reset to its factory setting with XG SYSTEM ON.	X	O	O					●					O	O	X
		09	1	00-7F	IVOCAL HARMONY PARAMETER 8			X	O	O					●					O	O	X
		0A	1	00-7F	IVOCAL HARMONY PARAMETER 9			X	O	O					●					O	O	X
		0B	1	00-7F	VOCAL HARMONY PARAMETER 10			X	O	O					O					O	O	X
		0C	1	00-7F	VOCAL HARMONY PART NUMBER	ON(64), OFF(0...63, 65...127)		X	O	O					●					O	O	O
TOTAL SIZE	0D																					
		14	1	00-7F	HARMONY CHANNEL	1...16(0...15), OFF(127)		X	O	O					●					O	O	X
TOTAL SIZE	1																					
		20	1	00-7F	VOCAL HARMONY PARAMETER 11			X	O	O					●					O	O	X
		21	1	00-7F	VOCAL HARMONY PARAMETER 12			X	O	O					●					O	O	X
		22	1	00-7F	VOCAL HARMONY PARAMETER 13			X	O	O					●					O	O	X
		23	1	00-7F	VOCAL HARMONY PARAMETER 14			X	O	O					●					O	O	X
		24	1	00-7F	VOCAL HARMONY PARAMETER 15			X	O	O					●					O	O	X
		25	1	00-7F	VOCAL HARMONY PARAMETER 16			X	O	O					●					O	O	X
TOTAL SIZE	6																					
		26	1	00-7F	VOCAL HARMONY PARAMETER 17			X	O	O					●					O	O	X
		27	1	00-7F	VOCAL HARMONY PARAMETER 18			X	O	O					●					O	O	X
		28	1	00-7F	VOCAL HARMONY PARAMETER 19			X	O	O					●					O	O	X
		29	1	00-7F	VOCAL HARMONY PARAMETER 20			X	O	O					●					O	O	X
		2A	1	00-7F	VOCAL HARMONY PARAMETER 21			X	O	O					●					O	O	X
		2B	1	00-7F	VOCAL HARMONY PARAMETER 22			X	O	O					●					O	O	X
		2C	1	00-7F	VOCAL HARMONY PARAMETER 23			X	O	O					●					O	O	X
		2D	1	00-7F	VOCAL HARMONY PARAMETER 24			X	O	O					●					O	O	X
		2E	1	00-7F	VOCAL HARMONY PARAMETER 25			X	O	O					●					O	O	X
		2F	1	00-7F	VOCAL HARMONY PARAMETER 26			X	O	O					●					O	O	X
		30	1	00-7F	VOCAL HARMONY PARAMETER 27			X	O	O					●					O	O	X
		31	1	00-7F	VOCAL HARMONY PARAMETER 28			X	O	O					●					O	O	X
		32	1	00-7F	VOCAL HARMONY PARAMETER 29			X	O	O					●					O	O	X
		33	1	00-7F	VOCAL HARMONY PARAMETER 30			X	O	O					●					O	O	X
		34	1	00-7F	VOCAL HARMONY PARAMETER 31			X	O	O					●					O	O	X
		35	1	00-7F	VOCAL HARMONY PARAMETER 32			X	O	O					●					O	O	X
		36	1	00-7F	VOCAL HARMONY PARAMETER 33			X	O	O					●					O	O	X
		37	1	00-7F	VOCAL HARMONY PARAMETER 34			X	O	O					●					O	O	X
		38	1	00-7F	VOCAL HARMONY PARAMETER 35			X	O	O					●					O	O	X
		39	1	00-7F	VOCAL HARMONY PARAMETER 36			X	O	O					●					O	O	X
		3A	1	00-7F	VOCAL HARMONY PARAMETER 37			X	O	O					●					O	O	X
		3B	1	00-7F	VOCAL HARMONY PARAMETER 38			X	O	O					●					O	O	X
		3C	1	00-7F	VOCAL HARMONY PARAMETER 39			X	O	O					●					O	O	X
		3D	1	00-7F	VOCAL HARMONY PARAMETER 40			X	O	O					●					O	O	X
		3E	1	00-7F	VOCAL HARMONY PARAMETER 41			X	O	O					●					O	O	X
		3F	1	00-7F	VOCAL HARMONY PARAMETER 42			X	O	O					●					O	O	X
		40	1	00-7F	VOCAL HARMONY PARAMETER 43			X	O	O					●					O	O	X
		41	1	00-7F	VOCAL HARMONY PARAMETER 44			X	O	O					●					O	O	X
		42	1	00-7F	VOCAL HARMONY PARAMETER 45			X	O	O					●					O	O	X
		43	1	00-7F	VOCAL HARMONY PARAMETER 46			X	O	O					●					O	O	X
		44	1	00-7F	VOCAL HARMONY PARAMETER 47			X	O	O					●					O	O	X
		45	1	00-7F	VOCAL HARMONY PARAMETER 48			X	O	O					●					O	O	X
TOTAL SIZE	20																					
04	00	60	2	00-7F	VOCAL EFFECT TYPE MSB			X	O	O					●					O	O	X
				00-7F	VOCAL EFFECT TYPE LSB																	
		62	2	00-7F	VOCAL EFFECT PARAMETER 1 MSB			X	O	O					●					O	O	X
				00-7F	VOCAL EFFECT PARAMETER 1 LSB																	

[MIDI] [Song Creator]

Address (H)			Size (H)	Data (H)	Parameter	Description		Voice		MIDI Reception					MIDI Transmission					PLAY		REC
								Regular/ Drum/ Organ Voice	Mic/Vocal Harmony	Song	Right1 Right2 Right3 Left	Keyboard	Style	Extra	Right1 Right2 Right3 Left	M.Pad	Style	Song	Upper Lower	PLAY	REW	From panel (Right1/ Right2/ Right3/ Left)
		64	2	00-7F 00-7F	VOCAL EFFECT PARAMETER 2 MSB VOCAL EFFECT PARAMETER 2 LSB			X	O			O					●			O	O	X
		66	2	00-7F 00-7F	VOCAL EFFECT PARAMETER 3 MSB VOCAL EFFECT PARAMETER 3 LSB			X	O			O					●			O	O	X
		68	2	00-7F 00-7F	VOCAL EFFECT PARAMETER 4 MSB VOCAL EFFECT PARAMETER 4 LSB			X	O			O					●			O	O	X
		6A	2	00-7F 00-7F	VOCAL EFFECT PARAMETER 5 MSB VOCAL EFFECT PARAMETER 5 LSB			X	O			O					●			O	O	X
		6C	2	00-7F 00-7F	VOCAL EFFECT PARAMETER 6 MSB VOCAL EFFECT PARAMETER 6 LSB			X	O			O					●			O	O	X
		6E	2	00-7F 00-7F	VOCAL EFFECT PARAMETER 7 MSB VOCAL EFFECT PARAMETER 7 LSB			X	O			O					●			O	O	X
		70	2	00-7F 00-7F	VOCAL EFFECT PARAMETER 8 MSB VOCAL EFFECT PARAMETER 8 LSB			X	O			O					●			O	O	X
		72	2	00-7F 00-7F	VOCAL EFFECT PARAMETER 9 MSB VOCAL EFFECT PARAMETER 9 LSB			X	O			O					●			O	O	X
		74	2	00-7F 00-7F	VOCAL EFFECT PARAMETER 10 MSB VOCAL EFFECT PARAMETER 10 LSB			X	O			O					O			O	O	X
		76	1	00-7F	VOCAL EFFECT SWTCH	ON(1–127), OFF(0)		X	O			O					●			O	O	O
		77	1	00-7F	VOCAL EFFECT OUTPUT LEVEL			X	O			O					O			O	O	X

TOTAL SIZE 18

04	00	7A	1	00-7F	VOCAL EFFECT PARAMETER 11			X	O			O					●			O	O	X
		7B	1	00-7F	VOCAL EFFECT PARAMETER 12			X	O			O					●			O	O	X
		7C	1	00-7F	VOCAL EFFECT PARAMETER 13			X	O			O					●			O	O	X
		7D	1	00-7F	VOCAL EFFECT PARAMETER 14			X	O			O					●			O	O	X
		7E	1	00-7F	VOCAL EFFECT PARAMETER 15			X	O			O					●			O	O	X
		7F	1	00-7F	VOCAL EFFECT PARAMETER 16			X	O			O					●			O	O	X

TOTAL SIZE 6

● : Transmitted via panel operations O : Available

MIDI Parameter Change table (MULTI PART)

[MIDI] [Song Creator]

Address (H)			Size (H)	Data (H)	Parameter	Description	XG Default (H)	Voice		MIDI Reception					MIDI Transmission					PLAY		REC
								Regular/ Drum/ Organ Voice	Mic/Vocal Harmony	Song	Right1 Right2 Right3 Left	Keyboard	Style	Extra	Right1 Right2 Right3 Left	M.Pad	Style	Song	Upper Lower	PLAY	REW	From panel (Right1/ Right2/ Right3/ Left)
8	nn	00	1	00-20	ELEMENT RESERVE	0...32	part10,26=0, other parts=2	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
		01	1	00-7F	BANK SELECT MSB	0...127	part10=7F, other parts=00	O	X	O	O	X	O	O	X	X	X	O	X	O	O	X
		02	1	00-7F	BANK SELECT LSB	0...127	00	O	X	O	O	X	O	O	X	X	X	O	X	O	O	X
		03	1	00-7F	PROGRAM NUMBER	1...128	00	O	X	O	O	X	O	O	X	X	X	O	X	O	O	X
		04	1	00-0F,7F	Rcv CHANNEL	1...16, OFF	Part No.	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
		05	1	00-01	MONO/POLY MODE	MONO, POLY	01	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
		06	1	00-02	SAME NOTE NUMBER KEY ON ASSIGN	SINGLE, MULTI, INST (for Drum)	01	O	X	O	X	X	O	X	X	X	X	O	X	O	X	X
		07	1	00-03	PART MODE	NORMAL, DRUM, DRUMS1...2	part10=02, other parts=00	O	X	O	X	X	X	X	●	X	●	●	X	O	X	O
		08	1	28-58	NOTE SHIFT	-24...0...+24[semitones]	40	O	X	O	O	X	O	O	X	X	X	O	X	O	O	X
		09 0A	2	00-0F 00-0F	DETUNE	-12.8...0...+12.7[Hz] 1st bit3-0→bit7-4 2nd bit3-0→bit3-0	08 00	O	X	O	O	X	O	O	X	X	X	O	X	O	X	X
		0B	1	00-7F	VOLUME	0...127	64	O	X	O	O	X	O	O	X	X	X	O	X	O	O	X
		0C	1	00-7F	VELOCITY SENSE DEPTH	0...127	40	O	X	O	O	X	X	O	●	O	X	O	X	O	O	O
		0D	1	00-7F	VELOCITY SENSE OFFSET	0...127	40	O	X	O	O	X	X	O	●	O	X	O	X	O	O	O
		0E	1	00-7F	PAN	RND,L63...C...R63	40	O	X	O	O	X	O	O	X	X	X	O	X	O	O	X
		0F	1	00-7F	NOTE LIMIT LOW	C-2...G8	00	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
		10	1	00-7F	NOTE LIMIT HIGH	C-2...G8	7F	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
		11	1	00-7F	DRY LEVEL	0...127	7F	O	X	O	O	X	O	O	X	O	●	●	X	O	O	O
		12	1	00-7F	CHORUS SEND	0...127	00	O	X	O	O	X	O	O	X	X	X	O	X	O	O	X
		13	1	00-7F	REVERB SEND	0...127	28	O	X	O	O	X	O	O	X	X	X	O	X	O	O	X
		14	1	00-7F	VARIATION SEND	0...127	00	O	X	O	O	X	O	O	X	X	X	O	X	O	O	O
		15	1	00-7F	VIBRATO RATE	-64...0...+63	40	O	X	O	O	X	O	O	X	X	X	O	X	O	O	X
		16	1	00-7F	VIBRATO DEPTH	-64...0...+63	40	O	X	O	O	X	O	O	X	X	X	O	X	O	O	X
		17	1	00-7F	VIBRATO DELAY	-64...0...+63	40	O	X	O	O	X	O	O	X	X	X	O	X	O	O	X
		18	1	00-7F	FILTER CUTOFF FREQUENCY	-64...0...+63	40	O	X	O	O	X	O	O	X	X	X	O	X	O	O	X
		19	1	00-7F	FILTER RESONANCE	-64...0...+63	40	O	X	O	O	X	O	O	X	X	X	O	X	O	O	X
		1A	1	00-7F	EG ATTACK TIME	-64...0...+63	40	O	X	O	O	X	O	O	X	X	X	O	X	O	O	X
		1B	1	00-7F	EG DECAY TIME	-64...0...+63	40	O	X	O	O	X	O	O	X	X	X	O	X	O	O	X
		1C	1	00-7F	EG RELEASE TIME	-64...0...+63	40	O	X	O	O	X	O	O	X	X	X	O	X	O	O	X
		1D	1	28-58	MW PITCH CONTROL	-24...0...+24[semitones]	40	O	X	O	O	X	X	O	X	X	X	O	X	O	X	X

[MIDI] [Song Creator]

Address (H)	Size (H)	Data (H)	Parameter	Description	XG Default (H)	Voice: Regular/ Drum/ Organ Voice	Voice: Mic/Vocal Harmony	MIDI Reception: Song	MIDI Reception: Right1 Right2 Right3 Left	MIDI Reception: Keyboard	MIDI Reception: Style	MIDI Reception: Extra	MIDI Transmission: Right1 Right2 Right3 Left	MIDI Transmission: M.Pad	MIDI Transmission: Style	MIDI Transmission: Song	MIDI Transmission: Upper Lower	PLAY: PLAY	PLAY: REW	REC: From panel (Right1/ Right2/ Right3/ Left)
1E	1	00-7F	MW LOW PASS FILTER CONTROL	-9600...0...+9450[cent]	40	O	X	O	O	X	X	O	●	O	X	O	X	O	O	O
1F	1	00-7F	MW AMPLITUDE CONTROL	-100...0...+100[%]	40	O	X	O	O	X	X	O	X	X	X	O	X	O	X	X
20	1	00-7F	MW LFO PMOD DEPTH	0...127	0A	O	X	O	O	X	X	O	●	O	O	O	X	O	O	O
21	1	00-7F	MW LFO FMOD DEPTH	0...127	00	O	X	O	O	X	X	O	●	O	O	O	X	O	O	O
22	1	00-7F	MW LFO AMOD DEPTH	0...127	00	O	X	O	O	X	X	O	●	O	O	O	X	O	O	O
23	1	28-58	BEND PITCH CONTROL	-24...0...+24[semitones]	42	O	X	O	O	X	O	O	X	X	X	O	X	O	X	X
24	1	00-7F	BEND LOW PASS FILTER CONTROL	-9600...0...+9450[cent]	40	O	X	O	O	X	O	O	X	X	X	O	X	O	X	X
25	1	00-7F	BEND AMPLITUDE CONTROL	-100...0...+100[%]	40	O	X	O	O	X	O	O	X	X	X	O	X	O	X	X
26	1	00-7F	BEND LFO PMOD DEPTH	0...127	00	O	X	O	O	X	O	O	X	X	X	O	X	O	X	X
27	1	00-7F	BEND LFO FMOD DEPTH	0...127	00	O	X	O	O	X	O	O	X	X	X	O	X	O	X	X
28	1	00-7F	BEND LFO AMOD DEPTH	0...127	00	O	X	O	O	X	O	O	X	X	X	O	X	O	X	X

TOTAL SIZE 29

30	1	00-01	Rcv PITCH BEND	OFF, ON	01	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
31	1	00-01	Rcv CH AFTER TOUCH(CAT)	OFF, ON	01	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
32	1	00-01	Rcv PROGRAM CHANGE	OFF, ON	01	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
33	1	00-01	Rcv CONTROL CHANGE	OFF, ON	01	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
34	1	00-01	Rcv POLY AFTER TOUCH(PAT)	OFF, ON	01	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
35	1	00-01	Rcv NOTE MESSAGE	OFF, ON	01	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
36	1	00-01	Rcv RPN	OFF, ON	01	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
37	1	00-01	Rcv NRPN	OFF, ON	XGmode=01, GMmode=00	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
38	1	00-01	Rcv MODULATION	OFF, ON	01	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
39	1	00-01	Rcv VOLUME	OFF, ON	01	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
3A	1	00-01	Rcv PAN	OFF, ON	01	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
3B	1	00-01	Rcv EXPRESSION	OFF, ON	01	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
3C	1	00-01	Rcv HOLD1	OFF, ON	01	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
3D	1	00-01	Rcv PORTAMENTO	OFF, ON	01	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
3E	1	00-01	Rcv SOSTENUTO	OFF, ON	01	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
3F	1	00-01	Rcv SOFT PEDAL	OFF, ON	01	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
40	1	00-01	Rcv BANK SELECT	OFF, ON	01	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
41	1	00-7F	SCALE TUNING C	-64...0...+63[cent]	40	O	X	O	O	X	O	O	●	X	●	O	X	O	O	O
42	1	00-7F	SCALE TUNING C#	-64...0...+63[cent]	40	O	X	O	O	X	O	O	●	X	●	O	X	O	O	O
43	1	00-7F	SCALE TUNING D	-64...0...+63[cent]	40	O	X	O	O	X	O	O	●	X	●	O	X	O	O	O
44	1	00-7F	SCALE TUNING D#	-64...0...+63[cent]	40	O	X	O	O	X	O	O	●	X	●	O	X	O	O	O
45	1	00-7F	SCALE TUNING E	-64...0...+63[cent]	40	O	X	O	O	X	O	O	●	X	●	O	X	O	O	O
46	1	00-7F	SCALE TUNING F	-64...0...+63[cent]	40	O	X	O	O	X	O	O	●	X	●	O	X	O	O	O
47	1	00-7F	SCALE TUNING F#	-64...0...+63[cent]	40	O	X	O	O	X	O	O	●	X	●	O	X	O	O	O
48	1	00-7F	SCALE TUNING G	-64...0...+63[cent]	40	O	X	O	O	X	O	O	●	X	●	O	X	O	O	O
49	1	00-7F	SCALE TUNING G#	-64...0...+63[cent]	40	O	X	O	O	X	O	O	●	X	●	O	X	O	O	O
4A	1	00-7F	SCALE TUNING A	-64...0...+63[cent]	40	O	X	O	O	X	O	O	●	X	●	O	X	O	O	O
4B	1	00-7F	SCALE TUNING A#	-64...0...+63[cent]	40	O	X	O	O	X	O	O	●	X	●	O	X	O	O	O
4C	1	00-7F	SCALE TUNING B	-64...0...+63[cent]	40	O	X	O	O	X	O	O	●	X	●	O	X	O	O	O
4D	1	28-58	CAT PITCH CONTROL	-24...0...+24[semitones]	40	O	X	O	O	X	X	O	X	X	X	O	X	O	X	X
4E	1	00-7F	CAT LOW PASS FILTER CONTROL	-9600...0...+9450[cent]	40	O	X	O	O	X	X	O	●	O	X	O	●	O	O	X
4F	1	00-7F	CAT AMPLITUDE CONTROL	-100...0...+100[%]	40	O	X	O	O	X	X	O	X	X	X	O	X	O	X	X
50	1	00-7F	CAT LFO PMOD DEPTH	0...127	00	O	X	O	O	X	X	O	●	O	X	O	●	O	O	X
51	1	00-7F	CAT LFO FMOD DEPTH	0...127	00	O	X	O	O	X	X	O	●	O	X	O	●	O	O	X
52	1	00-7F	CAT LFO AMOD DEPTH	0...127	00	O	X	O	O	X	X	O	●	O	X	O	●	O	O	X
53	1	28-58	PAT PITCH CONTROL	-24...0...+24[semitones]	40	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
54	1	00-7F	PAT LOW PASS FILTER CONTROL	-9600...0...+9450[cent]	40	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
55	1	00-7F	PAT AMPLITUDE CONTROL	-100...0...+100[%]	40	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
56	1	00-7F	PAT LFO PMOD DEPTH	0...127	00	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
57	1	00-7F	PAT LFO FMOD DEPTH	0...127	00	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
58	1	00-7F	PAT LFO AMOD DEPTH	0...127	00	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
59	1	00-5F	AC1 CONTROLLER NUMBER	0...95	10	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
5A	1	28-58	AC1 PITCH CONTROL	-24...0...+24[semitones]	40	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
5B	1	00-7F	AC1 LOW PASS FILTER CONTROL	-9600...0...+9450[cent]	40	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
5C	1	00-7F	AC1 AMPLITUDE CONTROL	-100...0...+100[%]	40	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
5D	1	00-7F	AC1 LFO PMOD DEPTH	0...127	00	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
5E	1	00-7F	AC1 LFO FMOD DEPTH	0...127	00	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
5F	1	00-7F	AC1 LFO AMOD DEPTH	0...127	00	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
60	1	00-5F	AC2 CONTROLLER NUMBER	0...95	11	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
61	1	28-58	AC2 PITCH CONTROL	-24...0...+24[semitones]	40	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
62	1	00-7F	AC2 LOW PASS FILTER CONTROL	-9600...0...+9450[cent]	40	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
63	1	00-7F	AC2 AMPLITUDE CONTROL	-100...0...+100[%]	40	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
64	1	00-7F	AC2 LFO PMOD DEPTH	0...127	00	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
65	1	00-7F	AC2 LFO FMOD DEPTH	0...127	00	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
66	1	00-7F	AC2 LFO AMOD DEPTH	0...127	00	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
67	1	00-01	PORTAMENTO SWITCH	OFF, ON	00	O (Except S.Articulation Piano, Organ Flutes)	X	O	O	X	X	O	X	X	X	O	X	O	O	X
68	1	00-7F	PORTAMENTO TIME	0...127	00	O	X	O	O	X	X	O	X	X	X	O	X	O	O	X
69	1	00-7F	PITCH EG INITIAL LEVEL	-64...0...+63	40	O	X	O	O	X	X	O	X	X	X	O	X	O	X	X
6A	1	00-7F	PITCH EG ATTACK TIME	-64...0...+63	40	O	X	O	O	X	X	O	X	X	X	O	X	O	X	X
6B	1	00-7F	PITCH EG RELEASE LEVEL	-64...0...+63	40	O	X	O	O	X	X	O	X	X	X	O	X	O	X	X
6C	1	00-7F	PITCH EG RELEASE TIME	-64...0...+63	40	O	X	O	O	X	X	O	X	X	X	O	X	O	X	X
6D	1	01-7F	VELOCITY LIMIT LOW	1...127	01	O	X	O	O	X	X	O	X	X	X	O	X	O	X	X
6E	1	01-7F	VELOCITY LIMIT HIGH	1...127	7F	O	X	O	O	X	X	O	X	X	X	O	X	O	X	X

TOTAL SIZE 3F

Address (H)			Size (H)	Data (H)	Parameter	Description	XG Default (H)	[MIDI] Voice: Regular/ Drum/ Organ Voice	Voice: Mic/Vocal Harmony	MIDI Reception: Song	MIDI Reception: Right1 Right2 Right3 Left	MIDI Reception: Keyboard	MIDI Reception: Style	MIDI Reception: Extra	MIDI Transmission: Right1 Right2 Right3 Left	MIDI Transmission: M.Pad	MIDI Transmission: Style	MIDI Transmission: Song	MIDI Transmission: Upper Lower	[Song Creator] PLAY: PLAY	PLAY: REW	REC: From panel (Right1/ Right2/ Right3/ Left)
		70	1		NOT USED		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
		71	1		NOT USED		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
		72	1	00-7F	EQ BASS GAIN	-12dB...+12dB	40	O	X	O	O	X	O	O	●	●	●	●	X	O	O	O
		73	1	00-7F	EQ TREBLE GAIN	-12dB...+12dB	40	O	X	O	O	X	O	O	●	●	●	●	X	O	O	O

TOTAL SIZE 04

		74	1		NOT USED		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
		75	1		NOT USED		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
		76	1	04-28	EQ BASS FREQUENCY	32...2.0k[Hz]	0C	O	X	O	O	X	X	O	●	O	●	O	X	O	O	O
		77	1	1C-3A	EQ TREBLE FREQUENCY	500...16.0k[Hz]	36	O	X	O	O	X	X	O	●	O	●	O	X	O	O	O
		78	1		NOT USED		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
		79	1		NOT USED		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
		7A	1		NOT USED		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
		7B	1		NOT USED		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
		7C	1		NOT USED		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
		7D	1		NOT USED		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
		7E	1		NOT USED		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
		7F	1		NOT USED		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

TOTAL SIZE 0C

0A	nn	40	1	00-7F	MW OFFSET LEVEL CONTROL	-100 - 100[%]	40	O	-	O	O	X	X	O	●	O	X	O	X	O	O	O
		41	1	00-7F	BEND OFFSET LEVEL CONTROL	-100 - 100[%]	40	O	-	O	X	X	X	X	X	X	X	O	X	O	O	X
		42	1	00-7F	CAT OFFSET LEVEL CONTROL	-100 - 100[%]	40	O	-	O	O	X	X	O	●	O	X	O	●	O	O	X
		43	1	00-7F	PAT OFFSET LEVEL CONTROL	-100 - 100[%]	40	O	-	O	X	X	X	X	X	X	X	O	X	O	O	X
		44	1	00-7F	AC1 OFFSET LEVEL CONTROL	-100 - 100[%]	40	O	-	O	X	X	X	X	X	X	X	O	X	O	O	X
		45	1	00-7F	AC2 OFFSET LEVEL CONTROL	-100 - 100[%]	40	O	-	O	X	X	X	X	X	X	X	O	X	O	O	X

TOTAL SIZE 06

● : Transmitted via panel operations O : Available

nn : PART NUMBER

If there is a Drum Voice assigned to the part, the following parameters are ineffective.
- BANK SELECT LSB
- PORTAMENTO
- MONO/POLY
- SCALE TUNING
- POLY AFTER TOUCH
- PITCH EG

MIDI Parameter Change table (A/D PART)

(In this table, the MIDI Reception and MIDI Transmission values are each printed once across all columns of their group.)

Address (H)			Size (H)	Data (H)	Parameter	Description		[MIDI] Voice: Regular/ Drum/ Organ Voice	Voice: Mic/Vocal Harmony	MIDI Reception (Song / Right1 Right2 Right3 Left / Keyboard / Style / Extra)	MIDI Transmission (Right1 Right2 Right3 Left / M.Pad / Style / Song / Upper Lower)	[Song Creator] PLAY: PLAY	PLAY: REW	REC: From panel (Right1/ Right2/ Right3/ Left)
10	0n	00	1	00-01	INPUT GAIN	MIC, LINE	* The A/D PART parameter cannot be reset to its factory setting with XG SYSTEM ON.	X	X	X	X	X	X	X
		01	1	00-7F	BANK SELECT MSB	0...127		X	X	X	X	X	X	X
		02	1	00-7F	BANK SELECT LSB	0...127		X	X	X	X	X	X	X
		03	1	00-7F	PROGRAM NUMBER	1...128		X	X	X	X	X	X	X
		04	1	00-0F,7F	Rcv CHANNEL	1...16,OFF		X	O	O	O	O	X	X
		05	1		NOT USED			-	-	-	-	-	-	-
		06	1		NOT USED			-	-	-	-	-	-	-
		07	1		NOT USED			-	-	-	-	-	-	-
		08	1		NOT USED			-	-	-	-	-	-	-
		09	1		NOT USED			-	-	-	-	-	-	-
		0A	1		NOT USED			-	-	-	-	-	-	-
		0B	1	00-7F	VOLUME	0...127		X	O	O	●	O	X	X
		0C	1		NOT USED			-	-	-	-	-	-	-
		0D	1		NOT USED			-	-	-	-	-	-	-
		0E	1	01-7F	PAN	L63...C...R63		X	O	O	●	O	X	X
		0F	1		NOT USED			-	-	-	-	-	-	-
		10	1		NOT USED			-	-	-	-	-	-	-
		11	1	00-7F	DRY LEVEL	0...127		X	O	O	●	O	X	X
		12	1	00-7F	CHORUS SEND	0...127		X	O	O	●	O	X	X
		13	1	00-7F	REVERB SEND	0...127		X	O	O	●	O	X	X
		14	1	00-7F	VARIATION SEND	0...127		X	O	O	●	O	X	X

TOTAL SIZE 15

● : Transmitted via panel operations O : Available

n : A/D Part Number (0)

MIDI Parameter Change table (DRUM SETUP)

										[MIDI]										[Song Creator]		
Address			Size	Data	Parameter	Description	XG Default	Voice		MIDI Reception					MIDI Transmission					PLAY		REC
(H)			(H)	(H)			(H)	Regular/ Drum/ Organ Voice	Mic/Vocal Harmony	Song	Right1 Right2 Right3 Left	Keyboard	Style	Extra	Right1 Right2 Right3 Left	M.Pad	Style	Song	Upper Lower	PLAY	REW	From panel (Right1/ Right2/ Right3/ Left)
3n	rr	00	1	00-7F	PITCH COARSE	-64...0...+63	40	O(Drum Only)	X	O(Available only for song parts)					O					O	X	X
		01	1	00-7F	PITCH FINE	-64...0...+63[cent]	40	O(Drum Only)	X	O(Available only for song parts)					O					O	X	X
		02	1	00-7F	LEVEL	0...127	Depends on the note	O(Drum Only)	X	O(Available only for song parts)					O					O	X	X
		03	1	00-7F	ALTERNATE GROUP	OFF, 1...127	Depends on the note	O(Drum Only)	X	O(Available only for song parts)					O					O	X	X
		04	1	00-7F	PAN	RND, L63...C...R63	Depends on the note	O(Drum Only)	X	O(Available only for song parts)					O					O	X	X
		05	1	00-7F	REVERB SEND	0...127	Depends on the note	O(Drum Only)	X	O(Available only for song parts)					O					O	X	X
		06	1	00-7F	CHORUS SEND	0...127	Depends on the note	O(Drum Only)	X	O(Available only for song parts)					O					O	X	X
		07	1	00-7F	VARIATION SEND	0...127	7F	O(Drum Only)	X	O(Available only for song parts)					O					O	X	X
		08	1	00-01	KEY ASSIGN	SINGLE, MULTI	00	O(Drum Only)	X	O(Available only for song parts)					O					O	X	X
		09	1	00-01	Rcv NOTE OFF	OFF, ON	Depends on the note	O(Drum Only)	X	O(Available only for song parts)					O					O	X	X
		0A	1	00-01	Rcv NOTE ON	OFF, ON	01	O(Drum Only)	X	O(Available only for song parts)					O					O	X	X
		0B	1	00-7F	LOW PASS FILTER CUTOFF FREQUENCY	-64...0...+63	40	O(Drum Only)	X	O(Available only for song parts)					O					O	X	X
		0C	1	00-7F	LOW PASS FILTER RESONANCE	-64...0...+63	40	O(Drum Only)	X	O(Available only for song parts)					O					O	X	X
		0D	1	00-7F	EG ATTACK RATE	-64...0...+63	40	O(Drum Only)	X	O(Available only for song parts)					O					O	X	X
		0E	1	00-7F	EG DECAY1 RATE	-64...0...+63	40	O(Drum Only)	X	O(Available only for song parts)					O					O	X	X
		0F	1	00-7F	EG DECAY2 RATE	-64...0...+63	40	O(Drum Only)	X	O(Available only for song parts)					O					O	X	X

TOTAL SIZE 10

										[MIDI]										[Song Creator]		
Address			Size	Data	Parameter	Description	XG Default	Voice		MIDI Reception					MIDI Transmission					PLAY		REC
(H)			(H)	(H)			(H)	Regular/ Drum/ Organ Voice	Mic/Vocal Harmony	Song	Right1 Right2 Right3 Left	Keyboard	Style	Extra	Right1 Right2 Right3 Left	M.Pad	Style	Song	Upper Lower	PLAY	REW	From panel (Right1/ Right2/ Right3/ Left)
		20	1	00-7F	EQ BASS GAIN	-12...+12[dB]	40	X	X	X					O					X	X	X
		21	1	00-7F	EQ TREBLE GAIN	-12...+12[dB]	40	X	X	X					O					X	X	X
		22	1		NOT USED		-	-	-	-					-					-	-	-
		23	1		NOT USED		-	-	-	-					-					-	-	-
		24	1	04-28	EQ BASS FREQUENCY	32...2.0k[Hz]	0C	X	X	X					O					X	X	X
		25	1	1C-3A	EQ TREBLE FREQUENCY	500...16.0k[Hz]	36	X	X	X					O					X	X	X
		26	1		NOT USED		-	-	-	-					-					-	-	-
		27	1		NOT USED		-	-	-	-					-					-	-	-
		28	1		NOT USED		-	-	-	-					-					-	-	-
		29	1		NOT USED		-	-	-	-					-					-	-	-
		2A	1		NOT USED		-	-	-	-					-					-	-	-
		2B	1		NOT USED		-	-	-	-					-					-	-	-
		2C	1		NOT USED		-	-	-	-					-					-	-	-
		2D	1		NOT USED		-	-	-	-					-					-	-	-

TOTAL SIZE 0E

n : Drum Setup Number (0-1)
rr : note number(0D-5B)

In the following cases, the instrument will initialize all Drum Setups.

XG SYSTEM ON received
GM SYSTEM ON received
GM LEVEL2 SYSTEM ON received
GS RESET received
DRUM SETUP RESET received (only when in XG mode)

[Note]

When a part to which a Drum Setup is assigned receives a program change, the assigned Drum Setup will be initialized.
If the same Drum Setup is assigned to two or more parts, changes in Drum Setup parameters (including program changes) will apply to all parts to which it is assigned.

SYSTEM EXCLUSIVE MESSAGES (1)

[GM1]...GM Required Parameter
[GM2]...GM Level2 Required Parameter

Not received when Receive System Exclusive Message Parameters is set to off.
Not transmitted when Transmit System Exclusive Message Parameters is set to off.

System Exclusive Messages (Universal Real Time Messages)

[MIDI] [Song Creator]

MIDI Event	Data Format	Voice		MIDI Reception					MIDI Transmission					PLAY		REC
		Regular/ Drum/ Organ Voice	Mic/Vocal Harmony	Song	Right1 Right2 Right3 Left	Keyboard	Style	Extra	Right1 Right2 Right3 Left	M.Pad	Style	Song	Upper Lower	PLAY	REW	From panel operations
Master Volume [GM2]	F0 7F XN 04 01 SS TT F7 11110000 F0 = Exclusive status 01111111 7F = Universal Real Time 0xxxnnnn XN = When N is received N=0-F, whichever is received. X=ignored 00000100 04 = Sub-ID #1=Device Control Message 00000001 01 = Sub-ID #2=Master Volume 0sssssss SS = Volume LSB 0ttttttt TT = Volume MSB 11110111 F7 = End of Exclusive	O	X	O (Available for extra parts of a song)					O					O	O	X
Master Fine Tuning [GM2]	F0 7F XN 04 03 SS TT F7 11110000 F0 = Exclusive status 01111111 7F = Universal Real Time 0xxxnnnn XN = When N is received N=0-F, whichever is received. X=ignored 00000100 04 = Sub-ID #1=Device Control Message 00000011 03 = Sub-ID #2=Master Fine Tuning 0sssssss SS = Fine Tuning LSB 0ttttttt TT = Fine Tuning MSB 11110111 F7 = End of Exclusive	O	X	O (Available for extra parts of a song)					O					O	X	X
Master Coarse Tuning [GM2]	F0 7F XN 04 04 SS TT F7 11110000 F0 = Exclusive status 01111111 7F = Universal Real Time 0xxxnnnn XN = When N is received N=0-F, whichever is received. X=ignored 00000100 04 = Sub-ID #1=Device Control Message 00000100 04 = Sub-ID #2=Master Coarse Tuning 00000000 00 0ttttttt TT = Coarse Tuning MSB 11110111 F7 = End of Exclusive	O	X	O (Available for extra parts of a song)					O					O	X	X
Reverb Parameter [GM2]	F0 7F XN 04 05 01 01 01 01 01 PP VV ... F7 11110000 F0 = Exclusive status 01111111 7F = Universal Real Time 0xxxnnnn XN = When N is received N=0-F, whichever is received. X=ignored 00000100 04 = Sub-ID #1=Device Control Message 00000101 05 = Sub-ID #2=Global Parameter Control 00000001 01 = Slot path length = 1 00000001 01 = Parameter ID width = 1 00000001 01 = Value width = 1 00000001 01 = Slot path MSB = 1 00000001 01 = Slot path LSB = 1 (Reverb) 0ppppppp PP = Parameter to be controlled. 0vvvvvvv VV = Value for the Parameter. : : 11110111 F7 = End of Exclusive Parameter(pp) Value(vv) Display -- pp=0 Reverb Type 0...8 0:RoomS 1:RoomM 2:RoomL 3:HallM 4:HallL(default) 8:GM Plate pp=1 Reverb Time 0...127 0...11.0s	O	O	O					O					O	O	X
Chorus Parameter [GM2]	F0 7F XN 04 05 01 01 01 01 02 PP VV ... F7 11110000 F0 = Exclusive status 01111111 7F = Universal Real Time 0xxxnnnn XN = When N is received N=0-F, whichever is received. X=ignored 00000100 04 = Sub-ID #1=Device Control Message 00000101 05 = Sub-ID #2=Global Parameter Control 00000001 01 = Slot path length = 1 00000001 01 = Parameter ID width = 1 00000001 01 = Value width = 1 00000001 01 = Slot path MSB = 1 00000010 02 = Slot path LSB = 2 (Chorus) 0ppppppp PP = Parameter to be controlled. 0vvvvvvv VV = Value for the Parameter. : : 11110111 F7 = End of Exclusive Parameter(pp) Value(vv) Display -- pp=0 Chorus Type 0...5 0:GM Chorus1 1:GM Chorus2 2:GM Chorus3 (default) 3:GM Chorus4 4:FB Chorus 5:GM Flanger pp=1 Mod Rate 0...127 0...15.5Hz pp=2 Mod Depth 0...127 pp=3 Feedback 0...127 pp=4 Send to Reverb 0...127	O	O	O					O					O	O	X

		[MIDI]												[Song Creator]		
MIDI Event	Data Format	Voice		MIDI Reception					MIDI Transmission					PLAY		REC
		Regular/ Drum/ Organ Voice	Mic/Vocal Harmony	Song	Right1 Right2 Right3 Left	Keyboard	Style	Extra	Right1 Right2 Right3 Left	M.Pad	Style	Song	Upper Lower	PLAY	REW	From panel operations
Channel Pressure (Aftertouch) [GM2]	F0 7F XN 09 01 0M PP RR ... F7 11110000 F0 = Exclusive status 01111111 7F = Universal Real Time 0xxxnnnn XN = When N is received N=0-F, whichever is received. X=ignored 00001001 09 = Sub-ID #1=Controller Destination Setting 00000001 01 = Sub-ID #2=Controller Type:01(Channel Pressure) 0000mmmm 0M = MIDI Channel (00-0F) 0ppppppp PP = Controlled Parameter 0rrrrrrr RR = Data : : 11110111 F7 = End of Exclusive Make sure to set both the controlled parameter and the range. Parameters not set will be restored to their default values. Control Parameter(pp) / Data(RR) / Description / Default Value pp=00 Pitch Control / 28H-58H / -24...0...+24semitones / 40H pp=01 Filter Cutoff Control / 00H-7FH / -9600...0...+9450cents / 40H pp=02 Amplitude Control / 00H-7FH / -100...0...+100% / 40H pp=03 LFO Pitch Depth / 00H-7FH / 0...127 / 00H pp=04 LFO Filter Depth / 00H-7FH / 0...127 / 00H pp=05 LFO Amplitude Depth / 00H-7FH / 0...127 / 00H	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
Controller (Control Change) [GM2]	F0 7F XN 09 03 0M CC PP RR ... F7 11110000 F0 = Exclusive status 01111111 7F = Universal Real Time 0xxxnnnn XN = When N is received N=0-F, whichever is received. X=ignored 00001001 09 = Sub-ID #1=Controller Destination Setting 00000011 03 = Sub-ID #2=Controller Type:03(Control Change) 0000mmmm 0M = MIDI Channel (00-0F) 0ccccccc CC = Controller Number (01H-1FH, 40H-5FH) 0ppppppp PP = Controlled Parameter 0rrrrrrr RR = Range : : 11110111 F7 = End of Exclusive Make sure to set both the controlled parameter and the range. Parameters not set will be restored to their default values. Control Parameter(pp) / Data(RR) / Description / Default Value pp=00 Pitch Control / 28H-58H / -24...0...+24semitones / 40H pp=01 Filter Cutoff Control / 00H-7FH / -9600...0...+9450cents / 40H pp=02 Amplitude Control / 00H-7FH / -100...0...+100% / 40H pp=03 LFO Pitch Depth / 00H-7FH / 0...127 / 00H pp=04 LFO Filter Depth / 00H-7FH / 0...127 / 00H pp=05 LFO Amplitude Depth / 00H-7FH / 0...127 / 00H	O	X	O	X	X	X	X	X	X	X	O	X	O	X	X
Key-Based Instrument Control [GM2]	F0 7F XN 0A 01 0M KK CC VV ... F7 11110000 F0 = Exclusive status 01111111 7F = Universal Real Time 0xxxnnnn XN = When N is received N=0-F, whichever is received. X=ignored 00001010 0A = Sub-ID #1=Key-Based Instrument Control 00000001 01 = Sub-ID #2=Controller 0000mmmm 0M = MIDI Channel (00-0F) 0kkkkkkk KK = Key Number 0ccccccc CC = Controller Number 0vvvvvvv VV = Value : : 11110111 F7 = End of Exclusive Make sure to set both the controlled number and the value. Control Number(CC) / Value(VV) / Description / Default Value CC=07H Volume / 00H-7FH / -100...0...+100% / 40H CC=0AH Pan / 00H-7FH (absolute) / L63...C...R63 / (Preset value) CC=5BH Reverb Send Level / 00H-7FH (absolute) / 0...Max / (Preset value) CC=5DH Chorus Send Level / 00H-7FH (absolute) / 0...Max / (Preset value)	O (Drum Only)	X	O	X	X	X	X	X	X	X	O	X	O	X	X

System Exclusive Messages (Universal Non-Real Time Messages)

[MIDI] [Song Creator]

MIDI Event	Data Format	Voice		MIDI Reception					MIDI Transmission					PLAY		REC
		Regular/ Drum/ Organ Voice	Mic/Vocal Harmony	Song	Right1 Right2 Right3 Left	Keyboard	Style	Extra	Right1 Right2 Right3 Left	M.Pad	Style	Song	Upper Lower	PLAY	REW	From panel operations
GM1 System On [GM1] [GM2]	F0 7E XN 09 01 F7 11110000 F0 = Exclusive status 01111110 7E = Universal Non-Real Time 0xxxnnnn XN = When N is received N=0-F, whichever is received. X=ignored 00001001 09 = Sub-ID #1=General MIDI Message 00000001 01 = Sub-ID #2=General MIDI On 11110111 F7 = End of Exclusive	O	-	O (Available for extra parts of a song)					O					O	X	O
GM2 System On [GM2]	F0 7E XN 09 03 F7 11110000 F0 = Exclusive status 01111110 7E = Universal Non-Real Time 0xxxnnnn XN = When N is received N=0-F, whichever is received. X=ignored 00001001 09 = Sub-ID #1=General MIDI Message 00000011 03 = Sub-ID #2=General MIDI2 On 11110111 F7 = End of Exclusive	O	-	O (Available for extra parts of a song)					O					O	X	X
General MIDI System Off [GM1] [GM2]	F0 7E XN 09 02 F7 11110000 F0 = Exclusive status 01111110 7E = Universal Non-Real Time 0xxxnnnn XN = When N is received N=0-F, whichever is received. X=ignored 00001001 09 = Sub-ID #1=General MIDI Message 00000010 02 = Sub-ID #2=General MIDI Off 11110111 F7 = End of Exclusive	O	-	O (Available for extra parts of a song)					O					O	X	X
Scale/ Octave Tuning [GM2]	F0 7E XN 08 08 JJ GG MM SS ... F7 11110000 F0 = Exclusive status 01111110 7E = Universal Non-Real Time 0xxxnnnn XN = When N is received N=0-F, whichever is received. X=ignored 00001000 08 = Sub-ID #1=MIDI Tuning Standard 00001000 08 = Sub-ID #2=scale/octave tuning 1byte form 0jjjjjjj JJ = Channel/option byte1 bits 0 to 1 = channel 15 to 16 bits 2 to 6 = reserved 0ggggggg GG= Channel byte2 - bits0 to 6 = channel 8 to 14 0mmmmmmm MM= Channel byte2 - bits0 to 6 = channel 1 to 7 0sssssss SS = 12byte tuning offset of 12 semitones from C to B 00H means -64cent 40H means 0cent 7FH means +63cent : : 11110111 F7 = End of Exclusive	O	X	O (Available for song parts)					O					O	X	X

SYSTEM EXCLUSIVE MESSAGES (2)

* Not received when Receive System Exclusive Message Parameters is set to off.
* Not transmitted when Transmit System Exclusive Message Parameters is set to off.

System Exclusive Messages (Style)

[MIDI]

MIDI Event	Data Format	Voice: Regular/ Drum/ Organ Voice	Voice: Mic/Vocal Harmony	MIDI Reception: Song	MIDI Reception: Right1 Right2 Right3 Left	MIDI Reception: Keyboard	MIDI Reception: Style	MIDI Reception: Extra	MIDI Transmission: Right1 Right2 Right3 Left	MIDI Transmission: M.Pad	MIDI Transmission: Style	MIDI Transmission: Song	MIDI Transmission: Upper Lower
Section Control	F0 43 7E 00 ss dd F7 11110000 F0 = Exclusive status 01000011 43 = YAMAHA ID 01111110 7E = Style 00000000 00 = 0sssssss ss = Switch No. 00H INTRO A 01H INTRO B 02H INTRO C 03H INTRO D 08H MAIN A 09H MAIN B 0AH MAIN C 0BH MAIN D 10H FILL IN AA 11H FILL IN BB 12H FILL IN CC 13H FILL IN DD 18H BREAK FILL 20H ENDING A 21H ENDING B 22H ENDING C 23H ENDING D 0ddddddd dd = Switch On/Off 00H(Off) 7FH(On) 11110111 F7 = End of Exclusive	-	-			O					●		
Tempo Control	F0 43 7E 01 t4 t3 t2 t1 F7 11110000 F0 = Exclusive status 01000011 43 = YAMAHA ID 01111110 7E = Style 00000001 01 = 0ttttttt t4 = tempo4 0ttttttt t3 = tempo3 0ttttttt t2 = tempo2 0ttttttt t1 = tempo1 11110111 F7 = End of Exclusive	-	-			O					●		
Chord Control	F0 43 7E tt d1 d2 d3 d4 F7 Type1 (tt=02) 11110000 F0 = Exclusive status 01000011 43 = YAMAHA ID 01111110 7E = Style 00000010 02 = type 1 0ddddddd d1 = chord root(cr) 0ddddddd d2 = chord type(ct) 0ddddddd d3 = bass note(bn) 0ddddddd d4 = bass type(bt) 11110111 F7 = End of Exclusive cr : Chord Root 0fffnnnn fff: b or #, nnnn: note(root) 0000nnnn 0n bbb — 0fff0000 x0 reserved 0001nnnn 1n bb — 0fff0001 x1 C 0010nnnn 2n b — 0fff0010 x2 D 0011nnnn 3n natural — 0fff0011 x3 E 0100nnnn 4n # — 0fff0100 x4 F 0101nnnn 5n ## — 0fff0101 x5 G 0110nnnn 6n ### — 0fff0110 x6 A 0fff0111 x7 B ct : Chord Type 0 - 34,127 00000000 00 0 Maj — 00010010 12 18 dim7 00000001 01 1 Maj6 — 00010011 13 19 7th 00000010 02 2 Maj7 — 00010100 14 20 7sus4 00000011 03 3 Maj7(#11) — 00010101 15 21 7b5 00000100 04 4 Maj(9) — 00010110 16 22 7(9) 00000101 05 5 Maj7(9) — 00010111 17 23 7(#11) 00000110 06 6 Maj6(9) — 00011000 18 24 7(13) 00000111 07 7 aug — 00011001 19 25 7(b9) 00001000 08 8 min — 00011010 1A 26 7(b13) 00001001 09 9 min6 — 00011011 1B 27 7(#9) 00001010 0A 10 min7 — 00011100 1C 28 Maj7aug 00001011 0B 11 min7b5 — 00011101 1D 29 7aug 00001100 0C 12 min(9) — 00011110 1E 30 1+8 00001101 0D 13 min7(9) — 00011111 1F 31 1+5 00001110 0E 14 min7(11) — 00100000 20 32 sus4 00001111 0F 15 minMaj7 — 00100001 21 33 1+2+5 00010000 10 16 minMaj7(9) — 00100010 22 34 cc 00010001 11 17 dim bn : On Bass Note — Same as Chord root 127:No bass chord bt : Bass Chord — Same as Chord type 127:No bass chord * Not received when Receive Chord System Exclusive Message Parameters is set to off. * Not transmitted when Transmit Chord System Exclusive Message Parameters is set to off.	-	-			O					●		
	Type2 (tt=03) 11110000 F0 = Exclusive status 01000011 43 = YAMAHA ID 01111110 7E = Style 00000011 03 = type 2 0ddddddd dd = note1 0ddddddd dd = note2 0ddddddd dd = note3 : : 0ddddddd dd = note10 11110111 F7 = End of Exclusive	-	-			O					X		

● : Transmitted via panel operations O : Available

System Exclusive Messages (XG)

[MIDI]

MIDI Event	Data Format	Voice		MIDI Reception					MIDI Transmission				
		Regular/ Drum/ Organ Voice	Mic/Vocal Harmony	Song	Right1 Right2 Right3 Left	Keyboard	Style	Extra	Right1 Right2 Right3 Left	M.Pad	Style	Song	Upper Lower
XG Parameter Changes	F0 43 1n 4C hh mm ll dd ... F7 11110000 F0 = Exclusive status 01000011 43 = YAMAHA ID 0001nnnn 1n = Device Number n=always 0(when transmit), n=0-F(when receive) 01001100 4C = Model ID 0hhhhhhh hh = Address High 0mmmmmmm mm= Address Mid 01111111 ll = Address Low 0ddddddd dd = Data : : 11110111 F7 = End of Exclusive	* Refer to XG Parameter Change Table.		O * Refer to XG Parameter Change Table.					O * Refer to XG Parameter Change Table.				
XG Bulk Dump	F0 43 0n 4C aa bb hh mm ll dd ... dd cc F7 11110000 F0 = Exclusive status 01000011 43 = YAMAHA ID 0000nnnn 0n = Device Number n=always 0(when transmit), n=0-F(when receive) 01001100 4C = Model ID 0aaaaaaa aa = Byte Count MSB 0bbbbbbb bb = Byte Count LSB 0hhhhhhh hh = Address High 0mmmmmmm mm= Address Mid 01111111 ll = Address Low 0ddddddd dd = Data : : 0ddddddd dd = Data 0ccccccc cc = Checksum 11110111 F7 = End of Exclusive	* Refer to XG Parameter Change Table.		O * Refer to XG Parameter Change Table.					O * Refer to XG Parameter Change Table.				
XG Parameter Request	F0 43 3n 4C hh mm ll F7 11110000 F0 = Exclusive status 01000011 43 = YAMAHA ID 0011nnnn 3n = Device Number n=always 0(when transmit), n=0-F(when receive) 01001100 4C = Model ID 0hhhhhhh hh = Address High 0mmmmmmm mm= Address Mid 01111111 ll = Address Low 11110111 F7 = End of Exclusive	-	-	O * Refer to XG Parameter Change Table.					O * Refer to XG Parameter Change Table.				
XG Dump Request	F0 43 2n 4C hh mm ll F7 11110000 F0 = Exclusive status 01000011 43 = YAMAHA ID 0010nnnn 2n = Device Number n=always 0(when transmit), n=0-F(when receive) 01001100 4C = Model ID 0hhhhhhh hh = Address High 0mmmmmmm mm= Address Mid 01111111 ll = Address Low 11110111 F7 = End of Exclusive	-	-	O * Refer to XG Parameter Change Table.					O * Refer to XG Parameter Change Table.				

System Exclusive Messages (Audio Recorder/Player Control)

[MIDI]

MIDI Event	Data Format	Voice		MIDI Reception					MIDI Transmission				
		Regular/ Drum/ Organ Voice	Mic/Vocal Harmony	Song	Right1 Right2 Right3 Left	Keyboard	Style	Extra	Right1 Right2 Right3 Left	M.Pad	Style	Song	Upper Lower
Audio Recorder/ Player Control	F0 43 73 01 50 19 00 00 dd F7 11110000 F0 = Exclusive status 01000011 43 = YAMAHA ID 01110011 73 = Tyros ID 00000001 01 = Model ID 01010000 50 = SubID 00011001 19 = SubID (Audio Recorder/Player Control) 00000000 00 = SubID 00000000 00 = SubID (Start/Stop Control) 0ddddddd dd = data dd=00H:Start, 01H:Stop, 02H:Pause 11110111 F7 = End of Exclusive Controls start/stop of the audio song, but this is not synchronized with the MIDI song.	X	X	O					X	X	X	O	X

System Exclusive Messages Special Operators (Vocal Harmony Additional Parameters)

[MIDI]

MIDI Event	Data Format	Voice		MIDI Reception					MIDI Transmission				
		Regular/ Drum/ Organ Voice	Mic/Vocal Harmony	Song	Right1 Right2 Right3 Left	Keyboard	Style	Extra	Right1 Right2 Right3 Left	M.Pad	Style	Song	Upper Lower
Vocal Harmony Vocoder Part (Harmony Part(Panel))	F0 43 73 01 11 0n 50 10 dd F7 11110000 F0 = Exclusive status 01000011 43 = YAMAHA ID 01110011 73 = Tyros ID 00000001 01 = Model ID 00010001 11 = Special Operators 0000nnnn 0n = Channel No. (Always 00) 01010000 50 = Vocal Harmony Additional Parameter Control No. 00010000 10 = Vocoder Part Parameter No. 0ddddddd dd = data 00H : Off 01H : Upper 02H : Lower 11110111 F7 = End of Exclusive	X	O			O					●		

● : Transmitted via panel operations O : Available

System Exclusive Messages (Others)

[MIDI]

MIDI Event	Data Format	Voice		MIDI Reception					MIDI Transmission				
		Regular/ Drum/ Organ Voice	Mic/Vocal Harmony	Song	Right1 Right2 Right3 Left	Keyboard	Style	Extra	Right1 Right2 Right3 Left	M.Pad	Style	Song	Upper Lower
Internal Clock (Clavinova compliance)	F0 43 73 01 02 F7 00000001 01 = Model ID 00000010 02 = Internal Clock Substatus	-	-			O					X		
External Clock (Clavinova compliance)	F0 43 73 01 03 F7 00000001 01 = Model ID 00000011 03 = External Clock Substatus	-	-			O					X		
Organ Flutes data Bulk Dump (Clavinova compliance)	F0 43 73 01 06 0B 00 00 01 06 0n [Bulk Data] sum F7 01H Model ID 06H Bulk ID 0BH Bulk No. (Organ Flutes data Bulk Dump) 00H,00H,01H,06H Data Length :16bytes 1st Channel No. 0nH 2nd Footage [1'] 00 - 08H 3rd [1 1/3'] 00 - 08H 4th [1 3/5'] 00 - 08H 5th [2'] 00 - 08H 6th [2 2/3'] 00 - 08H 7th [4'] 00 - 08H 8th [5 1/3'] 00 - 08H 9th [8'] 00 - 08H 10th [16'] 00 - 08H 11th [Attack 2'] 00 - 08H 12th [Attack 2 2/3'] 00 - 08H 13th [Attack 4'] 00 - 08H 14th Settings [Attack Length] 00 - 08H 15th [Response] 00 - 08H 16th [Attack Mode] 00 - 01H 00H: Each, 01H: First 17th [Wave Variation] 00 - 02H 00H: Sine, 01H: Vintage, 02H: Euro 18th [Volume] 01 - 09H 19th [aux] 00H 20th [aux] 00H 21th [aux] 00H 22th [aux] 00H sum Check Sum = 0-sum(BULK DATA)	O (Organ Flute)	X	O	O	X	X	O	●	X	X	O	X
MIDI Master Tuning	F0 43 1n 27 30 00 00 0m 0l cc F7 11110000 F0 = Exclusive status 01000011 43 = YAMAHA ID 0001nnnn 1n n= always 0(when transmit), n=0-F(when receive) 00100111 27 = Model ID of TG100 00110000 30 = Address High 00000000 00 = Address Mid 00000000 00 = Address Low 0000mmmm 0m = Master Tune MSB 00001111 0l = Master Tune LSB 0ccccccc cc = don't care 11110111 F7 = End of Exclusive	O	O			O					X		

● : Transmitted via panel operations O : Available

Song Meta Event List / Liste der Meta-Events der Songs / Liste des méta-événements des morceaux

Data Format	Parameter	Description	Note
FF 05 len [Data]	Lyrics	len=Data length, [Data]=Lyrics Data	-
FF 06 len [Data]	Marker	len=Data length, [Data]=Marker	Used as a Song Position Jump Marker.
FF 51 03 t1 t2 t3	Set Tempo	t1 t2 t3 =Tempo value B7 1B 00-01 D4 C0 (Tempo 5-500)	Entered when recording.
FF 58 04 nn dd cc bb	Beat	nn=Numerator, dd=Denominator (2n) cc=MIDI clock per metronome click, bb=Number of thirty-second notes in MIDI quarter note	Entered when recording.
FF 59 02 sf mi	Key Signature	sf=-7-7 mi=0: Major key, 1: minor key	Entered from the [Score] -> SETUP display.

YAMAHA META EVENT

FF 7F 06 43 73 0A 00 07 dd	Score Start Bar	ddH: Start from this measure dd= -100-1, 1-100	Same as ScBar entered from the [SONG CREATOR] ->SYS/EX. Display
FF 7F len 43 73 0D 01 [Data]	Keyboard Voice	Voice settings for the RIGHT1-3 and LEFT	Entered to the song from the [SONG CREATOR]->CHANNEL ->SETUP display.

YAMAHA XF META EVENT

FF 7F 07 43 7B 01 cr ct bn bt	Chord Name	Refer to "Chord Control" in the MIDI Data Format (System Exclusive Messages)	Entered when recording.
FF 7F 05 43 7B 03 20 08	Phrase Mark	Used as a marker for each phrase when executing Phrase Mark repeat playback.	Used when performing the Phrase Mark repeat playback.
FF 7F 04 43 7B 04 dd	Phrase Max	Maximum Phrase Number	Used when performing the Phrase Mark repeat playback.
FF 7F 05 43 7B 0C rr ll	Guide Track Flag	Sets the TRACK1 and TRACK2 parameters on the [FUNCTION]-> [SONG SETTING] display. rr = RIGHT CH (0: OFF, 1-16CH) ll = LEFT CH (0: OFF, 1-16CH)	Entered when recording.
FF 7F len 43 7B 21 00 pp [Data]	Lyrics Bitmap	Specifies the background picture of the Lyrics display. pp=Display type (0: Center, 1: Tile) [Data]=File Path	Entered to the song from the [SONG CREATOR]->CHANNEL ->SETUP display.

Song System Exclusive Message List / Liste der System-Exclusive-Meldungen der Songs / Liste des messages exclusifs au système de morceaux

Data Format	Parameter	Description	Note

Guide

Data Format	Parameter	Description	Note
F0 43 73 01 1F 00 cc dd F7	Guide Mode	ccH = Part Select No 00H (RIGHT CH=ON, LEFT CH=ON) 01H (RIGHT CH=OFF, LEFT CH=ON) 02H (RIGHT CH=ON, LEFT CH=OFF) 03H (RIGHT CH=OFF, LEFT CH=OFF) ddH = Mode 00H=Guide OFF 01H=Follow Lights 02H=Any Key 03H=Karao-Key	Entered to the song from the [SONG CREATOR]->CHANNEL->SETUP display.

Score

Data Format	Parameter	Description	Note
F0 43 73 01 50 12 00 00 dd F7	Left Part indication On/Off	00H: OFF, 7FH:ON	Entered to the song from the [SONG CREATOR]->CHANNEL->SETUP display.
F0 43 73 01 50 12 00 01 dd F7	Right Part indication On/Off	00H: OFF, 7FH:ON	
F0 43 73 01 50 12 00 02 dd F7	Lyrics indication On/Off	00H: OFF, 7FH:ON	
F0 43 73 01 50 12 00 03 dd F7	Chord indication On/Off	00H: OFF, 7FH:ON	
F0 43 73 01 50 12 00 04 dd F7	N.Name indication On/Off	00H: OFF, 7FH:ON	
F0 43 73 01 50 12 00 05 dd F7	Size designation	00H:SMALL, 01H:MIDDLE, 02H:LARGE, 03H:X-LARGE	
F0 43 73 01 50 12 00 06 dd F7	Left Ch	00H-0FH=CH, 7EH=OFF, 7FH=AUTO	
F0 43 73 01 50 12 00 07 dd F7	Right Ch	00H-0FH=CH, 7EH=OFF, 7FH=AUTO	
F0 43 73 01 50 12 00 08 dd F7	Quantize triplet On/Off	00H: Triplet OFF, 7FH: Triplet ON	
F0 43 73 01 50 12 00 09 dd F7	Quantize	00H: quarter, 01H: eighth, 02H: sixteenth, 03H: thirty-second	
F0 43 73 01 50 12 00 0A dd F7	NoteName	00H:ABC, 01H:FixedDo, 02H:MovableDo	
F0 43 73 01 50 12 00 0B dd F7	Color Note	00H:OFF, 7FH:ON	

Style

Data Format	Parameter	Description	Note
F0 43 73 01 51 00 00 00 03 10 00 dd F7	STYLE SPLIT POINT	dd=STYLE SPLIT POINT (Note Number)	Entered to the song from the [SONG CREATOR]->CHANNEL->SETUP display.
F0 43 73 01 51 05 00 03 04 00 00 dd dd F7	Style No.	dd dd = Style No.	Entered when recording.
F0 43 7E 00 ss dd F7	Section Control	Refer to the MIDI Data Format.	Entered when recording.

Audio Recorder/Player

Data Format	Parameter	Description	Note
F0 43 73 01 50 19 00 00 dd F7	Audio Recorder/Player Control	Controls start/pause/stop of the audio song, but this is not synchronized with the MIDI song. 00H:Start, 01H:Stop.02H:Pause	Edited from the [SONG CREATOR]->SYS/EX. display.

YAMAHA [Digital Workstation] Date:16-Jun-2010
Model TYROS4 MIDI Implementation Chart Version : 1.0

Function...		Transmitted	Recognized	Remarks
Basic Channel	Default	1 - 16	1 - 16	
	Changed	1 - 16	1 - 16	
Mode	Default	3	3	
	Messages	x	x	
	Altered	**************	x	
Note Number	: True voice	0 - 127 **************	0 - 127 0 - 127	
Velocity	Note ON	o 9nH,v=1-127	o 9nH,v=1-127	
	Note OFF	x 9nH,v=0	x	
After Touch	Key's	x	o	
	Ch's	o	o	
Pitch Bend		o	o 0-24 semi	
Control Change	0,32	o	o	Bank Select
	1,5,7,10,11	o	o	
	6,38	o	o	Data Entry
	64,65,66,67	o	o	
	71,72,73,74	o	o	Sound Controller
	80,81	o	o	
	84	o	o	Portamento Cntrl
	91,93,94	o	o	Effect Depth
	96,97	x	o	RPN Inc,Dec
	98,99	o	o	NRPN LSB,MSB
	100,101	o	o	RPN LSB,MSB
Prog Change	: True #	o 0 - 127 **************	o 0 - 127	
System Exclusive		o	o	
Common	: Song Pos.	x	x	
	: Song Sel.	x	x	
	: Tune	x	x	
System Real Time	:Clock	o	o	
	:Commands	o	o	
Aux Messages	:All Sound OFF	x	o(120,126,127)	
	:Reset All Cntrls	x	o(121)	
	:Local ON/OFF	x	o(122)	
	:All Notes OFF	x	o(123-125)	
	:Active Sense	o	o	
	:Reset	x	x	
Notes:				

Mode 1 : OMNI ON , POLY Mode 2 : OMNI ON , MONO o : Yes
Mode 3 : OMNI OFF, POLY Mode 4 : OMNI OFF, MONO x : No